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ABSTRACT

Part 2 of this congressional hearing contains the testimony and prepared statements of 31 witnesses on the topics of rural community resources, the rural labor force, rural finance, and rural education to assist the Subcommittee on Agriculture and Transportation in identifying the problems and potential of America's rural economy. With emphasis on rural health care delivery, the social service structures of small towns are described by nine witnesses. Among the topics considered by representatives of the Bureau of Labor Statistics, Department of Agriculture's Economic Research Service and Statistical Reporting Service, Cornell University, and University of Wisconsin are a profile of the rural labor force, rural unemployment data collection/reporting, underemployment, unique employment problems of the self-employed, sole proprietorships and family small businesses, and rural cost of living and inflation statistics. Witnesses representing the Federal Reserve System, Farm Credit Administration, American Bankers Association, Federal Deposit Insurance Corporation, a Nebraska bank, and the University of Wisconsin Department of Agricultural Economics present rural finance issues. Witnesses representing South Dakota school administrators, teachers, school boards, and parents discuss problems facing rural education including lack of adequate funding, declining student population, small tax bases, low teacher salaries, continuation of school lunch programs, and provision of special education services. (NEC)

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THE ECONOMIC EVOLUTION OF RURAL AMERICA

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HEARINGS

BEFORE THE

SUBCOMMITTEE ON
AGRICULTURE AND TRANSPORTATION
OF THE

JOINT ECONOMIC COMMITTEE
CONGRESS OF THE UNITED STATES

NINETY-NINTH CONGRESS

FIRST SESSION

PART 2

MAY 22, 1985—RURAL COMMUNITY RESOURCES

JUNE 13, 1985—THE RURAL LABOR FORCE

JUNE 19, 1985—RURAL FINANCE

JULY 1, 1985—RURAL EDUCATION

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RURAL COMMUNITY RESOURCES

WEDNESDAY, MAY 22, 1985

CONGRESS OF THE UNITED STATES,
SUBCOMMITTEE ON AGRICULTURE AND TRANSPORTATION
OF THE JOINT ECONOMIC COMMITTEE,
Washington, DC.

The subcommittee met, pursuant to notice, at 10:10 a.m., in room SD-562, Dirksen Senate Office Building, Hon. James Abdnor (chairman of the subcommittee) presiding.

Present: Senators Abdnor and D'Amato.

Also present: Dale Jahr, professional staff member.

OPENING STATEMENT OF SENATOR ABDNOR, CHAIRMAN

Senator ABDNOR. The Subcommittee on Agriculture and Transportation of the Joint Economic Committee will come to order. I want to welcome this distinguished panel of individuals we have here to testify today on a very, very important subject. As I am sure our staff has told you, we are trying to find out some facts and maybe even some suggestions on where we are going with our rural community in the future.

This is the third in a series of hearings focusing on rural America. To date, we have discussed in detail the rural economy and its problems and potential. Today, we are broadening our agenda dramatically by discussing another foundation of rural society. The rural economy and the rural social structure revolve around the types and quality of community services available to its residents.

Families remain the dominant social structure in rural areas. The family-run businesses are an important part of the local economy and the family-related activities are a big part of the social life of communities. But family members today are subject to dynamic changes and influences outside the family realm. In this modern age of easy and independent travel and modern communications, the rural culture is less isolated than it has been historically. And, due to tough financial circumstances, many families are coping with tremendous stress which is affecting relationships and eroding family ties.

Quality of life is determined in part by the variety of community services offered. Fundamental to this are the commercial goods and services available, social outlets, and the activities such as those offered by church and civic organizations, recreation facilities, and the like and, of course, health care, and education. In fact, all of these services are primary considerations of industry as they search for locations to establish their facilities.

(1)

Health care in rural areas is a challenging topic indeed. State-of-the-art medical technology is rapidly changing and becoming more expensive, requiring personnel to be better trained and more cost conscious. In many cases, these changes are making it difficult for small communities to provide all the services they desire. In remote areas, travel time can be the life-or-death factor in emergencies.

Rural America takes great pride in its educational traditions. Whether we are talking about one-room school houses or consolidated school districts, the quality of rural education is unsurpassed in the United States. Rural America truly educated all of America. Rural-educated residents have migrated to urban and metropolitan areas for decades, and these cities have been benefiting greatly by the able training of these citizens—and at no expense to local taxpayers. To the point, rural communities through the years have subsidized urban areas in this regard. I am curious as to whether this has resulted in a kind of “brain drain” on rural America as well.

Before we start, I want to say that I really believe in solving the problems of rural America because all of my State is rural, as you from South Dakota know. I go up and down those roads, through these towns, every week. Last week I was in a couple of our largest cities and a couple of small ones. I made a commencement speech over at New Effington, a town that is not very large. When you go up and down those main streets you have to ask yourself, what are we going to do to try to keep them alive? In this Congress, I do not find people that are that much concerned about rural America.

It is a tough, tough situation. I keep asking myself as I look, what is it we can do? There have to be certain things. Out in my State right now, on top of everything else—I know Mr. Farmer is coming from the West River country—over half of my State is going through a severe drought right now. I talk to people, they are under tremendous stress. I am shocked by some of the people, my very close friends, that I have never known to come under this kind of stress. Even when you have good crops right now in rural America, you are still under stress.

So, solutions are what we are searching for, and hopefully this is the kind of information we can get out of this hearing. We hope to bring it to the attention of other Members of Congress.

You have come from a long ways off and I have already taken far too much time.

Mr. Coward, can we start with you today?

STATEMENT OF RAYMOND T. COWARD, PROFESSOR OF SOCIAL WORK, CENTER FOR RURAL STUDIES, UNIVERSITY OF VERMONT

Mr. COWARD. Thank you, Mr. Chairman.

It is my privilege to join with you today in this discussion of the impact of the economy on rural families. By organizing and convening these hearings, you have begun to address a topic that for too long has not received the national and legislative attention it deserves, and those of us who live and work in rural America appreciate your determination.

In my opinion, two circumstances have contributed to the lack of attention that our Nation has directed toward the rural economy. First, the discovery in the 1970 census of a reversal in the century-long pattern of Americans migrating from the country to the city caused some to declare that a rural renaissance was underway.

This rejuvenation of rural America was in stark contrast to earlier images of small towns as places that had been left behind, and the new image of rural America implied that small towns were sought after places to live and that they were a good investment and location for manufacturers, and that they offered a quality of life that was unsurpassed in other parts of modern America.

Most of these popular accounts of what was happening in rural America, however, failed to portray the unevenness of this growth. Not all rural communities experienced a reversal in population migration, and certainly in the Northeast we have seen many who still continue to lose people. Not all rural communities have been able to attract industrial concerns to locate in their area and therefore there have been many rural communities which continue to experience severe problems of unemployment and underemployment.

I once heard a black economic development specialist from Mississippi comment that there were some shady spots in the Sun Belt, and he was implying that all communities in that region had not prospered the way some communities had. In our discussions here today, we must understand that the same is true of rural America. Small towns and rural communities have not equally shared in the fruits and bounties of the so-called rural renaissance. Some have grown and prospered, whereas others have continued to struggle with economic stagnation.

And even when the attention of our Nation can be focused on the rural economy, it seems to be fixated on one part—a very important part—namely, agriculture. I am certainly not suggesting that American farmers are not experiencing difficulties, even catastrophic economic difficulties; nor am I trying to deny the crucial role of agriculture in the overall rural economy. I just want us to be clear that farmers are not the only rural Americans who are coping with difficult economic problems.

For instance, we know that a greater percentage of rural families, as compared to urban families, have incomes which are below the poverty line, and that less than 10 percent of those live on farms. It is the so-called nonfarm segment of rural society which bears the brunt of poverty. Moreover, many of the heads of households of rural poor families are employed full time in the market place. And yet, they are still unable to make enough money to provide for their families. For these families, economic hard times are a way of life, and it is rare when the current robust expansion of the U.S. economy touches their lives.

We also know that only a small minority of rural workers are associated with agriculture. There are three times as many factory workers as farm workers in rural America. In addition, most rural workers are employed by small businesses, those same small businesses that you talked about in your opening statement that have found it hard to maintain their competitive edge and who have experienced unprecedented failures in this decade. As a consequence,

some rural workers have been forced to choose between two equally unsatisfactory alternatives—either move and relocate their family to where the jobs are, which are usually in metropolitan areas or those few boom town kind of rural areas, or take more marginal jobs in the local economy.

Now, when faced with economic stresses such as unemployment, underemployment, seasonal employment, reduced income, chronically lower pay scales, all families, including families in contemporary America, rely on a combination of two sources to aid them cope, their informal network—which is usually their family—and the formal network of services that exist in their community.

Now, families in contemporary rural America are not particularly advantaged in regard to the first form of help, the informal network, and are severely disadvantaged in regard to the availability of the second form of help, community services.

Despite nostalgic images of rural families who are immersed in a social network of family and friends which come to their aid in times of need, social science research has not particularly confirmed that notion. It is not that rural families are disadvantaged in regard to the availability and accessibility of informal help, it is just that they are not particularly advantaged in this respect when compared with their urban counterparts. Factors other than residence appear to be much more powerful in predicting whether a family is able to provide aid to someone in need.

And in regard to the second potential source of assistance, community services, there is little disagreement that rural residents are in an unfavorable position. Whether you are talking about institutional resources like hospitals, mental health clinics, job training programs, nursing homes, subsidized housing units or day care centers, or whether you want to talk about manpower resources like physicians, social workers, psychologists, public health nurses, rural residents have fewer community services available to them, and what is available is harder for them to reach and utilize.

This lack of community services sometimes reduces the ability of the family to cope with a variety of stresses which threaten their lifestyles. As a consequence, some rural families are unable to absorb that stress and sometimes are faced with dysfunctional behaviors like alcoholism, violence within the family, marital disruption, and desertion.

Let me sketch for you in conclusion a set of circumstances that I have seen time and time again ravish the resources of a family in rural America. The situation on which I want to focus has to do with the care of elders provided by families.

Despite the fact that as a nation we spend more than \$20 billion each year on long-term care of the elderly, in actuality most of the help provided to the elderly is done by the family. American families have not abandoned their older loved ones, nor abdicated their responsibilities. Frequently, the major proportion of that help falls on daughters—those very same daughters and wives who have been returning to the work place in uncommon numbers in order to allow their families to cope with the economic pressures that you have been studying.

Between 1970 and 1980 alone, the number of nonmetropolitan women 16 years and older participating in the labor force increased

by 4½ million persons or 53 percent. By 1980, half of all non-metropolitan women were in the labor force.

Many of these women feel caught in the middle between the competing demands of their elderly parents, their own husbands and children, and their jobs. It is not as if the majority of rural women are employed in well-paying professions; rather, they continue to be employed within a narrow range of occupations, mostly clerical and service jobs that generally offer low wages, minimum levels of prestige, and little chance of advancement.

Now, we have witnessed in the last decade the development of a number of services in our Nation intended to help the helpers, services aimed at augmenting the care that is provided by families—adult day care, respite care, support groups, educational seminars are all examples of the growth of programs which are intended to empower families to take care of their elders. But with few exceptions, these services are rarely available in rural communities—and declining rural communities are probably the last to receive such services.

The point of this whole vignette is that the absence of these community services can often result in rural families being caught between a rock and a hard place. Economic circumstances have made the dual-earner family a reality of contemporary rural America. Such life styles are most satisfactory and functional when there is a set of community services—such as child care, adult day care, after-school programs—which permit families to cope positively with the full range of their responsibilities. In the absence of such services, the demands and hardships which precipitate from certain stressors may exceed the ability of the family to respond.

Let me close by reminding all of us of three realities of family life in rural America in the 1980's. First, rural families have not somehow been protected from the major social problems that have infected other segments of our society. Nonmetropolitan families demonstrate rising rates of divorce, family violence, and adolescent pregnancies. Rural poverty is not uncommon. Many rural elderly live in deplorable conditions and, like their urban and suburban counterparts, rural families are experiencing significant increases in substance abuse, stress, and mental health problems. Do not allow our vision to be clouded by the myths that portray country living and rural life as simple, pure, and wholesome.

Second, economic circumstances have transformed the work places of rural America. Most rural workers now work off the farm and most rural families have two members employed in the labor force.

Finally, we must acknowledge that rural families are sometimes at a disadvantage when they attempt to cope with the hardships and demands of these new lifestyles. There is a need, I believe, for additional community services which are designed to support the family as it attempts to cope with these internal and external pressures.

Thank you for the opportunity to be here.

[The prepared statement of Mr. Coward follows:]

PREPARED STATEMENT OF RAYMOND T. COWARD

Mr. Chairman, Ladies and Gentleman of the Committee, it is my privilege to join with you today in your discussions of the impact of the economy on rural families and their communities. By organizing and convening these hearings you have begun to address a topic that for too long has not received the national and legislative attention it deserves, and those of us who live and work in rural America appreciate your determination to insure that our needs do not, once again, "fall between the cracks."

In my opinion, two circumstances have contributed to the lack of attention that our nation has directed towards the rural economy. First, the discovery in the 1970 Census of a reversal in the century-long pattern of Americans migrating from the country to the city caused some to declare that a "rural

renaissance" was underway.

This rejuvenation of rural America was in stark contrast to earlier images of small towns as places that had been "left behind." The "new" image of rural America implied that small towns were sought-after places to live, that they were good investments and locations for manufacturers and that they offered a quality of life that was unsurpassed in other parts of modern America -- and aggregate social and economic data existed to back-up each of these claims.

Most of these popular accounts of what was happening in rural America, however, failed to portray the unevenness of the rejuvenation that was occurring. Not all rural communities experienced a reversal in population migration -- many still continued to lose people. Not all rural communities were able to attract industrial concerns to locate in their areas and, therefore, there were many rural communities which continued to experience severe problems of unemployment and underemployment.

I once heard a Black economic development specialist from Mississippi comment that there were some "shady spots" in the Sun

Belt -- implying that all communities in the South and Southwest had not participated equally in the tremendous economic and population growth of that region. In our discussions here today, we must understand that the same is true of rural America -- small towns and rural communities have not equally shared in the fruits and bounties of the so-called rural renaissance -- some have grown and prospered; whereas others have continued to struggle with economic stagnation.

Even when the attention of the nation can be focused on the rural economy, it appears to be fixated on only one segment of that economy -- namely, agriculture. I am not suggesting that America farmers are not facing difficult, even catastrophic, economic difficulties; nor am I trying to deny the critical, and perhaps dominant, role agriculture plays in the overall rural economy. Rather, I want to remind each of us that farmers are not the only rural Americans coping with economic difficulties.

For instance, we know that a greater percentage of rural families (as compared to urban families) have incomes below the

poverty line but that less than 10% of those families live on farms. It is the so-called "non-farm" segment of rural society which bears the brunt of poverty. Moreover, many of the heads of households of rural poor families are employed full-time in the marketplace; yet, they are still unable to make enough money to provide for their families. For these families, economic hard-times are a way of life and it is rare when the current robust expansion of the overall U.S. economy touches their lives.

We also know that only a small minority of rural workers are associated with agriculture -- there are three times as many factory workers as farm workers in rural America! In addition, most rural workers are employed by small businesses -- those same small businesses that have found it hard to maintain their competitive edge in the world marketplace and who have experienced unprecedented numbers of failures in this decade. As a consequence, some rural workers have been forced to choose between two equally unsatisfactory alternatives -- either relocate their families to "where the jobs are" (usually either

metropolitan areas or "boon town" rural communities) or take more marginal jobs in the local economy.

When faced with economic stressors such as unemployment, underemployment, seasonal employment, reduced income, chronically lower pay scales or a diminished/depressed employment market, all families, including families in contemporary rural America, rely on a combination of two sources of aid to help them cope -- their informal support network (the most prominent element of which is their family) and the formal network of services that exist in their communities.

Families in contemporary rural America are not particularly advantaged in regard to the first source of help (the informal network), and are severely disadvantaged in regard to the second source of assistance (the availability of formal community services).

Despite nostalgic images of rural families who are emersed in a social support network of family and friends which comes to their aid in times of need, social science research has provided little support for this notion. It is not that rural families

are disadvantaged in regard to the availability and accessibility of informal network support, it is just that they are not particularly advantaged in this respect when compared with their urban counterparts. Factors other than residence appear to be much more powerful predictors of whether or not an individual will receive aid from his network of family and friends.

In regard to the second potential source of assistance, community services, there is little disagreement that rural residents are in an unfavorable position. Whether you are talking about institutional resources (like hospitals, mental health clinics, job training programs, nursing homes, subsidized housing units or day care centers) or manpower resources (like physicians, social workers, psychologists or public health nurses), rural residents have fewer community services available to them and what is available is harder to reach.

This lack of community services sometimes reduces the ability of the family to cope with a variety of stressors, including economic, which threaten their lifestyles. As a

consequence, some rural families are unable to absorb the stress with which they are faced and dysfunctional behaviors sometimes result -- behaviors like increased alcoholism, violence within the family, marital disruption or desertion.

Let me sketch for you a set of circumstances that I have seen time and time again ravish the resources, both economic and emotional, of families in rural America. The situation on which I want to focus has to do with the care of elders provided by families.

Despite the fact that as a nation we spend more than \$20 billion dollars each year on the long-term care of the elderly, in actuality, most care for the elderly is provided by the family. American families have not abandoned their older loved ones nor abdicated their responsibilities -- rather, our own research conducted in the Northeast has confirmed the work of others and has affirmed the prominent role of family members as caregivers to the elderly.

Frequently, a major proportion of this burden falls on daughters -- those very same daughters, and wives, who have been returning to the workplace in uncommon numbers in order to allow their families to cope with the economic realities of life in our society. Between 1970 and 1980 alone, the number of nonmetropolitan women 16 years and over participating in the labor force increased by 4.5 million persons or 53 percent. By 1980, 48 percent of all nonmetropolitan women were in the labor force.

Many of these women feel "caught in the middle" -- between the competing demands of their elderly parents, their own husbands and children and their jobs. And it is not as if rural women are employed in well-paying professions; rather, they continue to be employed within a narrow range of occupations (mostly clerical and service jobs) that generally offer low wages, minimum levels of prestige, and little chance of advancement.

To complicate matters further, there are few community services to which these families can turn to alleviate their burden. These are families who are trying desperately to fulfill their filial responsibility and to avoid the trauma of institutionalization for their elderly loved one -- and, for the most part, they must "go it alone." Yet, research has indicated repeatedly that families in such circumstances are at high-risk for dysfunction or breakdown because of the absence of a complimentary set of community services that would augment and aid their efforts.

We have recently witnessed the development of a number of gerontological services intended to "help the helpers" -- services aimed at augmenting the care provided by families. Adult day care, respite care, support groups and educational seminars are all examples of the growth of program intended to empower families to care for their elders. But, with few exceptions, these services are rarely available in rural communities -- and declining rural communities are probably the last to receive such

SERVICES.

The point of this vignette is that the absence of supportive community services can often result in families being caught between "the rock and the hard place." Economic circumstances have made the "dual-earner family" a reality of contemporary rural life. Such lifestyles, however, are most satisfactory and functional when there are a set of community services (such as child and adult day care or after school programs) which permit families to cope positively with the full range of their new responsibilities. In the absence of such services, the demands and hardships which precipitate from certain stressors may exceed the ability of the family to respond.

Let me close by reminding the Committee of just three "realities" of family life in rural America in the mid-1980s. First, rural families have not been somehow protected from the major social problems that have infected other segments of our society. Nonmetropolitan families demonstrate rising rates of divorce, family violence and adolescent pregnancies. Rural poverty is not uncommon, many rural elderly live in deplorable

conditions, and, like their urban and suburban counterparts, rural families are experiencing significant increases in substance abuse, stress, and mental health problems. Do not allow your vision to be clouded by myths that portray country living and rural family life as simple, pure, and wholesome; slower paced; free from pressures and tensions; and surrounded by pastoral beauty and serenity.

Second, economic circumstances have transformed the workplaces of rural America. Most rural workers now work off the farm and most rural families have two members employed in the laborforce. Both of these realities imply that public policies aimed at the farm family that includes an in-place homemaker will not reflect the needs of a majority of rural families.

Lastly, we must acknowledge that rural families are sometimes at a disadvantage when they attempt to respond to the hardships and demands of new lifestyles which has been shaped, in part, by stark economic realities. There is a need, I believe, for additional community services which are designed to support the family as it attempts to cope with the internal and external stressors of life in contemporary rural America.

Thank you for the opportunity to share with you my thoughts and perspectives on this important topic.

Senator ABDNOR. Thank you. You have laid it out pretty well for us.

The next witness I met with not too many months ago. Things were not great then and I do not think they have improved much since that time.

It is a pleasure to have you here, Mr. Farmer.

STATEMENT OF VAL FARMER, WEST RIVER MENTAL HEALTH CENTER, RAPID CITY, SD

Mr. FARMER. Thank you for inviting me, Senator.

"If I were the bank and I looked at my balance sheets, I would not lend me any more money either."

Those were the words of a 42-year-old Torrington, WY, farmer given in an interview to a Denver newspaper. Two months later, he was dead, leaving behind a widow and a family.

What is wrong with these supposed tough farmers and ranchers that they end up taking their own lives? How are they any different than an unemployed steel worker in Pittsburgh or Cleveland?

Let us listen to the words of this man himself and those of his wife and neighbors as they try to make sense of the tragedy.

"I am not offering my family the strength I should. I am too scared. I am totally lost. I have never been tossed to the four winds before." His greatest concerns were for his aging parents. "The loss that is traumatic is watching my aging parents get pushed out. My father is in his 70's, he has nowhere to go. There are not many jobs available for someone his age," the farmer confided.

His wife said that he could not face "losing so many things he loved, his very identity," on the farm where he was born. "We were so deep in debt, we knew that we would have to sell. He felt he had nothing to offer us."

His neighbor offered these thoughts.

When you spend 42 years of your life going out into the field and doing something, when you grow up working in the fields and then the rug is pulled out from under you and suddenly there is no next year, well, it has to do something to your mind.

A Minnesota man called in to a mental health center hotline to discuss his suicidal thoughts.

I am afraid of what I am going to do. I will not be able to face not being a farmer. My grandfather had this farm, my father had it through the depression, and now I am losing it.

Neighbors of a South Dakota farm family with dire financial problems donated seed, fuel, fertilizer, and machinery to help the family plant a spring crop. A neighbor who helped said,

We need them out here. What are they going to do in town except push others out of a job? This has been going on for years. Twenty years ago, I could stand in my yard and see 13 farms. Where is it going to end, when there is one big farm in the country?

The pain is not just with foreclosures and voluntary liquidations, but with the loss of a way of life while yet on the farm. A Wisconsin dairy farmer explains,

We used to make a nice living with 26 cows. My wife was not working, we were raising a family. The kids were in school. We would go fishing on Lake Winnebago, catch nice pike.

Now, with 60 head of cattle, he is,

Spending 14 hours a day, 7 days a week, including a couple of hours Sunday afternoon because the hired man has Sunday afternoon off. We are surviving. We are struggling to survive. I am behind on payments on the feed bills. I am slightly behind in the bank payments. But I have been able to plateau so we are not going further behind.

He knows neighbors that are losing in that race. They lose heart. They do not call the vet because they know it will run up the bill. They do not have that spring in their walk when they go from the house to the barn, and then they start holding back on the feed.

These are examples of the one-quarter to one-third of our Nation's farmers that are facing these kinds of emotional and economic problems.

Is the threat farmers feel merely economic, the loss of a business and income for the family, or is it the loss of a cherished way of life? This is the debate between the lender and the farmer. This is the debate the lender and the farmer had in the movie "Country." From the standpoint of economic survival, the family farm is another business entity competing in a tough, tough market place. From the standpoint of emotional survival, the family farm is the centerpiece of a way of life that nourishes families and communities.

What is it that is so different? Urban residents whose primary allegiance with place and neighborhood has been severed will not be able to emotionally grasp what comes next.

There is a love of the land, a bond between the people and soil, a bond between the steward and the growth of plant and animal life he nourishes, and a spiritual nourishment of the steward by the nature he serves. The planting, the cultivating, the harvesting are intrinsically rewarding activities. Besides a livelihood, farmers extract rich meaning from soil and sunlight.

Senator ABDNOR. Mr. Farmer, I am going to have to interrupt you.

Mr. FARMER. Sure.

Senator ABDNOR. I want to introduce you to Senator D'Amato of New York who has been very, very interested in rural problems. You may be interested to know, he has visited South Dakota. He is a very active and involved member of this committee and I was surprised to learn how interested he is in the rural countryside, too.

Then I realized why, after he gave me some figures and facts on New York. Would you like to make a statement, Senator D'Amato?

Senator D'AMATO. Thank you, Mr. Chairman. I do have another committee hearing. I would like to put my statement in the record in its entirety.

I commend you, Mr. Chairman, for holding these hearings because, certainly, they are most important in attempting to deal with the needs of rural America.

I would imagine Professor Dunne has more of an understanding about New York State than do most New Yorkers. Many people think that New York is just that highrise, subway, crime-infested, drug-infested area so often reported in the media with these sensational stories of the problems, attendant, that I just touched on.

But it indeed is this Nation's third leading agricultural producing State, and its No. 1 industry is the agricultural industry. It directly or indirectly provides 400,000-plus jobs and contributes about \$10 billion to the economy, \$3 billion which comes from the farms directly.

So, we probably have a lot more in common—the upstate communities in New York, our farming communities—than one would imagine. So, I am certainly appreciative of Senator Abdnor's honing in on this problem, his leadership in taking on this matter, because I think if you prioritize your programs you can get much more for your dollar and help lead our Nation out of the doldrums in the agricultural areas.

So, Senator, thank you so very much for your leadership in this important area.

Senator ABDNOR. I thank you, Senator D'Amato. Tell me, I have never traveled upper New York State—

Senator D'AMATO. We have some hearings set up.

Senator ABDNOR. That is right, we do. But you, too, have communities that are dying, more or less, they do need some rejuvenating. The population is going down, people are leaving.

Senator D'AMATO. Mr. Chairman, not too dissimilar from the testimony that Mr. Farmer was just making are the stories of the farmers, particularly the dairymen, who have been in this business for generation after generation who are most reluctantly moving out; whose young people are not following; where it has become financially impossible to buy, for example, the tractor.

We recently had the first hearings on the farm bill to be held in New York State in 15 years. I would be remiss if I did not pay public testimony of my deep appreciation to Chairman de la Garza in the House. He held an agricultural hearing in Syracuse, NY which is central New York and which both in the south and northern regions you might say, it is surrounded with farming communities, vast numbers of farms.

We find that the agricultural base is diminishing, and there are a number of reasons, not the least of which is the terrible competition which the farmers face, the horticultural farmers in particular, from our Canadian neighbors.

It is not just related to the strength of the American dollar, but to a policy which the Canadian Government has undertaken to encourage export. Our farmers, I think, in South Dakota or in upstate New York can compete against any farmer throughout the world, but they cannot compete against the treasuries of the Canadian Government and other governments, and we find increasingly that that is the case.

I spoke to the Canadian people and said, "Let me ask you, are you subsidizing your farmers?"

"Oh, no, we are not." I mean, they are strangers to the truth, let me tell you. So I said, "Well, how is it that they are selling potatoes at \$4 a hundredweight when you tell us that their costs are \$5?" It is like the guy who is doing business and is losing a dollar a hundred, so he figures he is going to cut down his loss by increasing production. That is exactly what they have done. They have plowed more acres, in the past number of years 100,000, I think,

additional acres have come under cultivation. Of course, they are subsidizing them.

They subsidize the crop storage. They subsidize the transportation, and they give them back 90 percent of what the average price has been, they guarantee that over a 5-year period of time.

I dare say, in many of the other States, I know in Maine, we have our farmers, who are great farmers and who are great Americans who live on the soil, as you say, and who are important to economic viability.

Senator, we are in deep distress and they cannot compete. I do not think that our State Department and our Commerce Department have been doing nearly enough in this area to seek fair play.

Senator ABDNOR. Now we are trying to pick up the pieces in our rural health, our education. The very things you are talking about have created problems before.

Senator D'AMATO. Rural housing programs become more necessary.

[The written opening statement of Senator D'Amato follows:]

WRITTEN OPENING STATEMENT OF HON. ALPONSE M. D'AMATO

Mr. Chairman, I thank you for conducting this important hearing. I was pleased to be here last week to hear testimony on "rural economic development" and I am equally pleased to be here today to discuss "rural community resources."

As you know, the Congress is grappling with a huge budget deficit. This problem, coupled with high interest rates, has had a negative effect on all of America, rural or urban. However, the impact may be greater in our rural communities. Vital services, such as, health, education, transportation and retail services suffer in rural communities simply because there are fewer of these services available than in urban centers.

Rural America is changing and so are its needs. Many families over the last several decades have left rural communities to find opportunities in urban areas. We must, therefore, adopt Federal programs that reflect this change so that rural America will not only survive, but will thrive as it once did.

Thank you, Mr. Chairman.

Senator ABDNOR. I interrupted you, Mr. Farmer.

Mr. FARMER. I was discussing rural values and why it is so difficult for farmers to face this financial crisis, and I am going to continue to discuss rural values and then wind up my testimony about half-way through my prepared statement, just to give you a feeling for the emotional crisis that farm families are facing.

They see the efforts of their own hands grow with the years. The subtle improvement in breeding stock or increases in yield from a crop are creative expressions of the soil just as much as a work of art. A poet said, "Work is life made visible. In the country, we are surrounded by artists at work."

Add to this mystical communion with their work the values of freedom and independence associated with owning one's own business, and it is easy to see why farmers are highly satisfied with their profession. In farming and ranching, there are unique opportunities for husband-wife togetherness and joint economic and family venture. The equality and harmony as men and women blend their talents and dreams surpasses what most urban people receive or expect from their marriages.

The rural community is viewed as highly supportive of family life, within its gentle confines, children learn responsibility, values, work and cooperation. The ties with parents and relatives are

strong because of the rootedness of the people. There is a sense of family belonging and continuity that bolsters identity. The land is a part of the heritage that is passed on from generation to generation and binds families with a sense of mission larger than themselves.

The legacy of the land is the key gift in the transmission of family heritage. There is a sacred family duty to preserve the land and the sacrifices and struggles of those who have gone before. To lose the land is to betray a family trust both to past and future generations.

In a mobile nation where most people do not know their neighbors, farmers experience the power of love and caring of those around them and give that same love and care to others. It is a dimension of life that too few experience. Those who rely and depend on this sense of community regard it as a valued part of life that they do not want to lose. They cannot imagine themselves being separated from the network of family and friends with whom they feel secure and comfortable.

Through their collective efforts, they work to preserve community life by serving the church, schools, community boards, farm organizations, youth groups, and much more. They grow because of the leadership opportunities and because of their service, the bonds and attachment farm families feel toward their communities grow.

What I have just described to you is a myth, but it is a myth that farmers believe in, strive for, and use to sustain their hard-working sacrifices. It is the rationale for farmers struggling to make a living out of a tremendous investment in a risky business, and to tenaciously hold on when it is to their financial detriment.

Now, do you understand why the farm credit crisis is so devastating? These are good families, the best families, the top producers, being caught up by unfortunate circumstances of poor timing, of using debt as a capital resource to improve or expand their farms when the conventional wisdom and lending practices encourage them to do so.

At this point, I will stop in my testimony.

[The prepared statement of Mr. Farmer follows:]

PREPARED STATEMENT OF VAL FARMER

"If I were the bank and I looked at my balance sheets, I wouldn't lend me more money either."

Those were the words of a 42 year old Torrington, Wyoming farmer given in an interview to a Denver newspaper. Two months later, he was dead, leaving behind a widow and a family.

What is wrong with these supposed tough farmers and ranchers that they end up taking their own lives. How are they any different than an unemployed steel worker in Pittsburgh or Cleveland?

Let's listen to the words of this man himself--and those of his wife and his neighbor as they try to make sense of the tragedy.

"I'm not offering my family the strength I should. I'm too scared...I'm totally lost. I've never been tossed to the four winds before." His greatest concerns were for his aging parents. "The loss that's traumatic is watching my aging parents get pushed out. My father is in his 70s. He has nowhere to go. There aren't many jobs available for someone his age," the farmer confided.

His wife said he couldn't face "losing so many things he loved, his very identity," on the farm where he was born. "We were so deep in debt we knew we'd have to sell. He felt he had nothing to offer us."

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The pain isn't just with the foreclosures and voluntary liquidations, but with a the loss of a way of life while yet on the farm. A Wisconsin dairy farmer explains "We used to make a nice living with 26 cows. My wife wasn't working, we were raising a family, the kids were in school--we'd go fishing at Lake Winnebago, catch nice pike..."

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afternoon because the hired man has Sunday afternoon off. We're surviving. We're struggling to survive. I'm behind in payments on feed bills. I'm slightly behind in bank payments... (t t) I have been able to plateau so we're not going further behind."

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Is the threat farmers feel merely economic--the loss of a business and income for the family--or is it the loss of a cherished way of life? This is the debate the lender and the farmer had in the movie "Country". From the standpoint of economic survival, the family farm is another business entity competing in a tough, tough marketplace. From the standpoint of emotional survival, the family farm is the centerpiece of ^A way of life that nourishes families and communities.

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their hard work and sacrifices. It is the rationale for farmers struggling to make a living out of a tremendous investment in a risky business and to tactically hold on when it is to their financial detriment.

Now do you understand why the farm credit crisis is so devastating. These are good families, the best families, the top producers being caught up by unfortunate circumstances of poor timing of using debt as a capital resource to improve or expand their farms when the conventional wisdom and lending practices encouraged them to do so.

It was a common mistake. It was fueled by inflation and skyrocketing land values. Land prices had gone up for thirty years in a row. Who could predict when that bubble would burst? Farmers who financed their improvements on the basis of appreciation of land values and inflation are faced with a downward spiral and erosion of their capital base. The cash flow and profitability in agriculture are not sufficient to pay the high interest costs on their loans.

Who do we blame?

The farmers for being greedy?

Or the lenders for making easy loans?

Or the government for high deficit spending?

Or the third world countries for being caught in the same credit crunch and who can no longer afford our agricultural products?

Or President Reagan and the Federal Reserve

Board for helping to break the inflationary psychology of the 70s?

Or the high cost of technological improvements in agriculture that lured farmers into higher and higher capital expenditures?

Or national agricultural policies that creates prices that are undercut by our foreign competitors?

Or the trade policies of other countries subsidizing their farmers and creating an unfair competitive environment or restrict the entry of our products into their markets?

Or any other legitimate and favorite villains I have left out?

Of all the forces interacting to create the agricultural crisis, singling out the farmer for blame shifts the responsibility for the problem and solution on to his shoulders when his level of control is minuscule.

All too often the farmer does shoulder this responsibility personally. He feels he has failed and let down his family and heritage. In his mind and with the clarity of hindsight, he feels he should have foreseen the rapid economic turnaround and prevented his farm from being jeopardized. The guilt and loss of self-esteem are crushing.

His reaction may be denial. While he ignores reality and pins his hopes on magical solutions, the clock is ticking away on his high debt load, further eroding his asset base and making the solutions more difficult.

His reaction may be to work harder doing the same old

thing, thinking that hard work will somehow save him. The problem isn't with the work but with financial planning and decision-making.

His reaction may be one of anger and blame. While searching for the cause and possible political solutions to his problem, he may ignore his own management responsibility to look after the survivability of his own farm operation. Mired in blame and recrimination, he will not be choosing the appropriate action steps at a level where he does have some measure of control.

The world in which he lives is filled with "nice" people where the good one does is returned, where the Golden Rule is practised and people take care of each other. In his profession, the average US farmer fills the stomachs of about 75 other people in the world.

For farmers used to taking care of each other in a big extended family, it is difficult to accept the fact that niceness and economic success don't translate on a one to one basis. Heavenly blessings come by obeying heavenly rules. Economic prosperity comes by obeying economic rules.

It is easy to understand why, when these values are mixed with rich religious and community life, a farmer, convinced of the worthiness and deservingness, would be upset when a greater power, such as government, doesn't intervene and make everything right.

The same struggles and pain the farmer feels, his wife

also feels. She may also be carrying the added burden of worry about his emotional well-being and his refusal to open up and talk about his feelings. The fabled ethic of self-sufficiency works against the farmer when he cannot admit weakness or when he feels he should be able to solve everything himself.

His school age children are left in the dark about what is going on. They feel the stress and tension and react symptomatically to this threat that is engulfing and overwhelming their family. They may be witnessing alcohol abuse or marital conflict.

The children may in turn compound the problem by blaming their father for being a poor manager. They see their own futures going down the drain and feel the same assortment of feelings described above but without an outlet for discussion about what it means.

The future looks fearful to the farmer. Besides his cultural ties to a way of life, his work and professional skills are general and geared to manipulating a complex environment with a variety of agriculturally related knowledge acquired over a lifetime. What other job will challenge him and put to use his combination of diverse talents?

For all his general skills and versatility, he is in a sense a specialist being displaced into an urban job market where he doesn't fit. The jobs he is looking at won't have the status of land ownership, the freedom of a business owner nor the potential compensation he could have in

agriculture during good years.

Does all this condone a hopeless view for those families facing severe economic stress? No, the explanations are provided to give a sense of the tremendous pain, hurt and frustration that exist in our rural communities.

There are worse things in life than a farmer being forced out of farming. There is the stress of war, loss of loved ones, affliction of debilitating illnesses, injuries or handicaps, pain of divorce, ect. The triumph of the human spirit is that people meet the crises of life positively and with resilience.

Farm families and rural communities are responding in a positive way to the challenges facing them. Management skills and record-keeping are being tightened up. Families are working and communicating together in cooperative fashion. The stigma against having problems and weakness is breaking down and is being replaced by openness and a willingness to seek help.

There are self-help groups forming among farm families, community forums to discuss common problems, and a reaching out to those who are experiencing economic plight. The rural mental health services are gearing up and educating themselves about farm families under stress and are starting to provide relevant services.

Farm management and counseling services under the auspices of state governments and extension services are

attempting to fill the need of providing needed financial and legal information to farm families. Hotline services have emerged to provide emotional help and referral services. Clergy, county agents, lenders and others are being trained to recognize emotional problems and to use their access to families in trouble to provide help in assisting them to focus on constructive responses to their problems.

There is a new awareness of the dependency of small town businesses on the rural economy. Local governments are taking steps to ease the tax burdens of farm families. Also civic leaders are taking new steps to build the economic base of their communities by attracting new businesses. Town and country are being brought closer together by their common problems.

There are good things happening but they are spotty and not enough. States vary tremendously from each other in their recognition and response to the rural crisis.

Here is a list of some of the problems:

1. Farm families haven't used existing family and mental health services well. The awareness and relevance of these services need to be promoted and legitimized.
2. There is a lack of broad-based information and referral services for rural families where they can get vital information on how and where to proceed with their problems.
3. There is a need for paraprofessional training of

Indigenous clergy, county agents, lenders and others to assist farm families and to serve as gatekeepers for other more specialized services.

4. The availability and quality of local mental health services varies in local communities. There is a shortage of higher level professionals that can deal effectively with the complicated emotional and economic problems that farm families in crisis present. Scarcity of services and distances from services mean many families will not be adequately served.

5. The quality of legal services in rural communities also is varied. Information on bankruptcy law needs to be disseminated broadly among attorneys so that misinformation does not create major economic hardship on families already in the throes of crisis.

6. Extension services providing management and financial information are quickly becoming overloaded and unable to cope with the rising demand for service. This comes in an era when cutbacks, instead of expansion have been the rule.

7. A regional data bank on existing employment opportunities could link dislocated farmers and prospective employers. The local small town economies are not sufficient to absorb the exodus of families from farming. Farmers need sensitive counseling to help them identify who they are and what they have to offer. They need concrete assistance in helping realize their capabilities and marketable skills and get

them a new job. Retraining programs may be an important second step to this process.

8. Existing bureaucratic rules for accessing existing services need to be examined with reference to the special circumstances of farm families. For example, a bank may choose to let the ownership of property to technically remain in the hands of the farmer and allow the family to maintain residence until such time there is a market for the property. A family in this circumstance finds themselves disqualified from participation in the food stamp program.

Although there is no shortage of ideas, I'm going to step outside of my field to offer some policy suggestions that could assist the middle-size family farmer stay in business and to be remain competitive. I am indebted to Jan Flora, a rural sociologist at Kansas State University for assisting me with the following perspectives.

1. Change the tax structure to eliminate the incentives for investment. This would reduce the demand for capital, drive down the interest rate, lower the value of the dollar against other currencies, and provide an economic environment where foreign markets could be expanded.

This action would bring us back to a producing economy instead of a speculative one that encourages capital shortages. The administration proposal for tax simplification offers the best guidelines that would help agriculture. One banker estimates that balancing the federal budget would

have the effect of lowering interest rates one percent while enacting the tax simplification program would have a create a three percent decline in interest rates.

2. Eliminate the advantage for non-fulltime farmers in the tax code. Specifically, these are the provisions for investment tax credits, accelerated depreciation and capital gains treatment contained in the 1981 tax code. These provisions make it attractive for outside investors to put capital into agriculture to reduce their tax burden from other income and, once they have accessed the tax advantages, sell off their resources at a profit. They can lose money on the actual operations yet recoup their investment in a lighter tax burden and sale.

The non-fulltime farmer, farming the tax code, creates a product that adds to the oversupply problem in agriculture and a downward pressure on prices. The price for his product is an incidental concern compared to his tax treatment of his investment. Capital gains for so-called improvements, such as breaking up sod for crop production, is another example of the tax code distorting the financial incentives for production.

3. Farm programs have been a useful mechanism for controlling supplies and establishing stability of prices though they have primarily benefited larger size operations. A graduated payment schedule under the price support system could favor the smaller and middle-size operations while

retaining some incentive to larger operators for participation. The phased reduction of these programs to enhance the export market is preferable to drastic cuts when so many farmers are experiencing precarious economic problems.

Our nation's farmers and ranchers are real people caught in a vicious credit crunch. Their pain and hurt will worsen next fall and spring. As a compassionate country, we should take steps to ease that pain. As a "can do" country, we need to accurately diagnose the problem and put public policies into place that support profitability in agriculture. More than anything else, farmers need to look into the future and sense that the sun will emerge from behind dark clouds to shine on a heritage and a way of life preserved for their children and their children's children.

Senator ABDNOR. Thank you. We will be getting back to you on that because, as I said when I opened this up, it really concerned me last spring. I can tell the difference when I am in the East and when I am in the West.

Mr. FARMER. It is going to be worse next spring, Senator.

Senator ABDNOR. I am not going to argue about that. Mr. Christenson.

**STATEMENT OF JAMES A. CHRISTENSON, UNIVERSITY OF
KENTUCKY, LEXINGTON, KY**

Mr. CHRISTENSON. Mr. Chairman, rural America is experiencing troubled times. To a large extent, the oil and coal boom in the West has gone bust. The debt situation of farmers is at a critical stage. Many rural industries are moving to Third World countries. Unemployment in rural America remains high. The decrease in Federal support for social and economic programs for rural America comes at a time when social and economic problems are increasing.

All of these affect the quality of rural community life and rural services. In short, most of rural America is not sharing in the economic growth occurring in other sectors of the society.

Today, I would like to discuss unique conditions of rural America which influence the opportunities for economic growth in rural areas. To some extent, the community infrastructure which includes the availability of a broad range of adequate services is a necessary precondition for economic growth. Firms located in areas that can provide water, sewage treatment, police and fire protection, and roads have sustained economic production. While the existence of adequate community services does not guarantee economic development, without them, rural communities cannot compete with urban areas for new employment opportunities.

The problems of rural America are quite different from urban America. As a result, policies directed toward enhancing the general economy, while well intentioned, do not necessarily meet the needs of rural areas.

How do rural and urban areas differ? Well, first of all, the scale of effects from industrial and population growth is much greater on rural than on urban communities. Development of a business which employs 50 people has a nearly invisible impact on a large city, but the location of such a business can dramatically increase the employment opportunities in a rural community.

Second, rural communities usually depend upon one or two dominant industries—whether it is agriculture, forestry, manufacturing, or something else. Events over the last several years clearly demonstrate the fragility of a single-sector economy. Rural communities are simply not buffered from the problems which confront specific industries in the same manner as they are in large urban areas.

Third, compared with cities, rural areas have a greater proportion of people in poverty, more extreme poverty among minority groups, more inadequate housing, poor roads and bridges, worse fire protection, and more difficulty in financing solutions to these problems.

Fourth, rural areas must overcome a condition that usually defines rurality—that is, small population size distributed over a considerable geographical area. Providing services in rural areas fundamentally is a different problem than in urban areas.

Fifth, small rural communities often lack the capacity for responding to State and Federal grant opportunities. Small communities seem destined to fare poorly in competition for whatever financial and technical assistance is available at the State and national level. While cities employ professional grant writers, rural communities must depend on town officials who are, by necessity, generalists and, to a considerable extent, unpaid volunteers.

Sixth, attacking rural and urban problems often requires quite different assumptions. The heterogeneity of rural areas where dilapidated rundown housing often exists side-by-side with modern expensive housing requires quite different assumptions, costs, and methods for the implementation of housing programs than of urban areas.

Seventh, the attention of State government to rural problems is often limited. Just as rural America seems disadvantaged in competition with urban interests in the U.S. Congress, a similar situation exists in many if not most State legislatures. Urban dominance of our legislatures continues to increase, placing rural areas in a politically disadvantaged position in the competition for limited resources.

Eighth, in the information society, the ability to become economically competitive with urban America will depend upon being wired-in and therefore able to access computer, video, and other telecommunications processes and services. Because of greater population densities, most of urban America seems destined to be wired-in first. Besides receiving information services more slowly, the cost for rural America will likely be greater.

The national strategy of the present administration is that local citizens should, with appropriate assistance from national resources, identify and solve their own problems. This contradicts and replaces a long-established pattern of Federal leadership in rural development. It endorses a grass-roots philosophy of community development with emphasis on local initiative, local control, and selective use of outside resources to achieve local goals.

This assumes a local capacity for effective collective action, given adequate assistance. To adopt a national policy without first testing or proving this assumption is to place rural America in serious jeopardy of falling further behind in the competition for social and economic growth. There are major difficulties with this general approach and other difficulties with specific elements of a strategy that needs immediate attention.

At the general level, a major difficulty is that many rural development programs result from forces beyond local and State control. There is little evidence, for example, that local efforts to promote economic development have more than a marginal effect on the geographical distribution of economic activities. Many of the problems of rural areas are regional and national in scope and cannot be resolved through local action alone. Indeed, the number of problems that can be solved locally is limited.

Particular elements of the national strategy present specific problems that need to be addressed as this strategy is implemented. For example, the flow of Federal resources to rural areas is to be reorganized and is likely in practice to be reduced. Rural areas in many States have little power in State-level decisionmaking. Yet, this political influence is critical if we are no longer to earmark funds for rural areas.

Additionally, the concept of rural enterprise zones as a means of increasing rural jobs and income poses some potential difficulties. One is the fact that development efforts will be focused on only a few of the many rural areas where jobs and income are lacking. As employment is the keystone of any rural development program, stimulation of increased employment in only a few select areas could contribute to more severe problems in others. For example, will these enterprise zones attract resources from other, equally deficient rural areas not so designated. In effect, we will be enriching one rural area at the expense of another.

Reduced Federal intervention is likely to lead to reduced, rather than increased, chances of local rural localities becoming or remaining viable social, political, and economic entities. The role of the Federal Government in the past has served to balance the market in interest group influences impacting rural localities. What is proposed is a reduction of this role, and rural communities could suffer as a consequence.

The difficulties identified in the strategy and the suggestions for implementation are presented not to challenge the governing philosophy of the policy but to draw attention to the needs for a more comprehensive approach to rural development. The reality of the current situation is that growth in the national economy might occur without a significant rural development.

Jobs and income must be the initial focus of an effective rural development policy. A strategy that does not start with jobs just does not start. Rural development, to promote a diversified rural economy—with diversity being the chief defense against instability in particular industries—is essential if strong rural communities are to be developed and maintained.

Without diversified economies, rural communities have no basis for quality rural services which are the essential infrastructure for attracting new industries. People are forced to leave their communities in search of employment, and this tears apart the social well-being of small towns and rural areas. People are forced to leave their communities in search of employment, and this tears apart the social well-being. The need for improved services in rural areas has reached, in my estimation, a critical stage. Space, low population density, and high levels of poverty combine to deny adequate levels of health care, child care, education, and related services to many rural Americans.

Distance from urban centers increases the cost, and for many people it decreases the likelihood that services will in fact be delivered. In many communities, increased demands for services in recent years have not been matched by an increased availability of resources to provide services. Consequently, public officials already face a crisis situation, and in many instances the solutions are not in sight. Indeed, the solutions do not exist within the local areas.

Rural development, I believe, is everybody's business, and that makes it Federal business. Reducing the gap between rural and urban areas on indicators of social well-being is in the general national interest. A concerted attack on multiple fronts is needed.

The Federal role must be one of leadership, leadership in articulating a national rural development policy and leadership in providing the resources to sustain this policy. Otherwise, the forces that have contributed to these pressing rural problems will continue to restrict progress in rural development. State and local efforts are vital to the progress of rural development, but these must be organized within the context of resolve and action at the national level.

One of the most obvious facts of rural life in an essentially urban society is that many problems have their roots not in local areas but in the structure and functioning of the larger society. A major component of the Federal role in rural development, therefore, should be one of national leadership in promoting changes that will have direct consequence for solving world problems.

Thank you, Mr. Chairman.

[The prepared statement of Mr. Christenson follows:]

PREPARED STATEMENT OF JAMES A. CHRISTENSON
A NEED FOR FEDERAL LEADERSHIP IN RURAL DEVELOPMENT

Rural America is experiencing troubled times. To a large extent, the oil and coal boom in the West has gone bust. The debt situation of farmers is at a critical stage. Many rural industries are moving to Third World countries. Unemployment in rural America remains high. The decrease in federal support for social and economic programs for rural America comes at a time when social and economic problems are increasing. All of these affect the quality of rural community life and rural services. In short, most of rural America is not sharing in the economic growth occurring in other sectors of the society.

The fate of rural communities is a question of national policy. If we are concerned that rural areas face the prospect of becoming pockets of poverty, under and unemployment, inadequate services, and limited socioeconomic opportunities, then a coherent national strategy for development is mandatory. But, if we are not concerned that an integral part of our national heritage, our rural communities, are jeopardized by market and other forces beyond their control, then the design and implementation of an effective rural development policy is unimportant. I believe we are here today because we share a commitment to sustaining a diversity of lifestyles, and equality of opportunities and parity of services regardless of residential location.

Today I would like to discuss the unique conditions of rural America which influence the opportunities for economic growth in rural areas. Much of my discussion will emphasize how community services relate to economic vitality. To some extent, the community infrastructure, which includes the availability of a broad range of adequate services, is a necessary precondition for economic growth. Firms locate in areas which can provide the water, sewage treatment, police and fire protection, and roads which sustain

economic production. While the existence of adequate community services does not guarantee economic development, without them, rural communities cannot compete with urban areas for new employment opportunities. I'll assess the current policies toward rural America, and how these policies can influence the prospects for future social and economic growth in rural America.

First, let me discuss how rural and urban problems differ and why special attention needs to be directed toward rural America. I believe the need for specific rural development policies is greater today than ever before. The problems of rural America are quite different from urban America. As a result, policies directed toward enhancing the general economy, while well intentioned, do not necessarily meet the needs of rural areas.

How Do Rural and Urban Problems Differ

Scale of Effects

First, the scale of effects from industrial and population growth are much greater on rural than urban communities. Development of a business that employs 50 people has a nearly invisible impact on a large city. But, the location of such a business would dramatically increase the employment opportunities of a rural community. It also would strain the capacity of the sewage, fire protection, and other community services because such services are seldom larger than the communities they serve. Likewise, the loss of a community (e.g., bank failure) affects a small communities much more than a larger one.

Dependence on One or Two Industries

Second, rural communities usually depend on one or two dominant industries, whether agriculture, forestry, manufacturing, or something else. Events of the last several years clearly demonstrate the fragility of the single sector economy. Many oil-boom communities of the 1970s are now going bust. Weather, farm prices, and farm debt are causing extremely difficult

times for communities where agriculture is dominant. There also is considerable threat that the labor-intensive industries that moved to rural areas of the United States in the 1970s will join the overseas exodus in the 1980s. Rural communities are simply not buffered from the problems which confront specific industries in the same manner as large urban areas.

Extremeness of Problems

Third, compared with cities, rural areas have a greater proportion of people in poverty, more extreme poverty among minority groups, more inadequate housing, poorer roads and bridges, worse fire protection, and more difficulty in financing solutions to these problems. Because of the dependence on a narrow industrial base, unemployment in some rural counties occasionally reaches excruciatingly high levels, far above those of urban areas of the nation.

Small Population Size Over Considerable Geographic Area

Fourth, in servicing its population rural areas must overcome a condition that usually defines rurality--that is, small population size distributed over considerable geographic area. Providing services to rural people is fundamentally a different problem than in urban areas. Rural people have to travel over wider distances to obtain the services they need. The problem is not that rural communities don't have services. Instead, it is the problem that individual communities have only a few of the services local residents need. Living in a rural community today often means seeking economic and social services in many other distant rural and urban communities.

Another aspect of the small population size/physical space problem is evident in the effects of changing rate structures in certain industries. It is usually cheaper to fly across the country than to fly from one end of a

state to the other. Similar cost disparities may occur soon for telephone services throughout the country.

Capacity to Respond to Grant Opportunities

Fifth, small rural communities often lack the capacity for responding to state and federal grant opportunities. Small communities seem destined to fare poorly in competition for whatever financial and technical assistance is available at the state and national level. While cities employ professional grant writers, rural communities must depend on town officials who are, by necessity, generalists and, to a considerable extent, unpaid volunteers. The issue of capacity goes well beyond grantsmanship.

During the 1960s and 1970s, rural communities learned to build vertical ties between each of their services and corresponding services in the region and state. Local medical people developed relationships to medical services outside the community. Education and law enforcement did the same thing. This strategy made sense in those times when state and federal support could be sought independently. Now, as communities are forced to become self-reliant, they find themselves simultaneously facing a growth in service demands and significant reductions in their abilities to finance these improvements.

Different Requirements for Agency Programs

Sixth, attacking rural and urban problems often requires quite different assumptions. Dealing with dilapidated housing, poverty, and/or unemployment in urban areas may allow one to target specific city blocks and assume that contact with clients can be made by walking. The heterogeneity of rural areas where dilapidated rundown housing often exists side-by-side with modern expensive housing requires quite different assumptions, costs, and methods for the implementation of housing programs than those for urban areas.

Commitment of State Governments to Rural Issues

Seventh, the attention of state government to rural problems is often limited. Just as rural America seems disadvantaged in competition with urban interests in the U.S. Congress, a similar situation exists in many--if not most--state legislatures. Urban dominance of our legislatures continues to increase, placing rural areas in a politically disadvantaged position in the competition for limited resources.

Advent of the Information Era

Eighth, perhaps the most compelling reason for a national rural development policy is that we are moving into an information era that seems destined to produce massive changes in the problems faced by both rural and urban communities. Products produced in the information society will be more tailored to the needs of specific users. Difficult as it is to forecast the changes that will overtake our society in the next decade or two, we seem destined to dramatically increase our reliance on computers and telecommunications. These technologies provide opportunities to overcome problems in rural space to a degree unprecedented since the advent of the telephone. Yet, in the information society, the ability to become economically competitive with urban America will depend upon being wired-in and therefore able to access computer, video, and other telecommunication services. Because of greater population densities, most of urban America seems destined to be wired before rural America. Besides receiving information services more slowly, the cost for rural areas will likely be greater. Another disturbing, but very different issue associated with the information era is the likelihood that rural communities will be increasingly bypassed as people make direct deposits in money-market funds, make even greater use of telephone/mail-order houses, and depend less on local service

providers.

The problems faced in the past by rural communities were not simply ones of using urban assumptions for attacking rural problems. Rather, it was a problem of using a set of assumptions which fit neither with most rural communities nor most urban communities. The nation needs specific urban policies just as it needs specific rural policies.

The National Strategy

The governing philosophy of the present administration is that local citizens should, with appropriate assistance from national sources, identify and solve their own problems. The rural development strategy, therefore, consists of actions and proposals for transferring decision-making authority from federal to state and local levels; increasing the responsiveness of federal agencies to state and local priorities; and, providing aid and assistance but with a minimum of federal direction, control, and funding. The current national strategy emphasizes four problems identified by an advisory panel of rural Americans.

Rural Facilities and Services

A new program of block grants to states will consolidate some of the programs of Farmers' Home Administration (FmHA) and others in the Community Development Block Grants (CDBG) program that serve rural needs. States will decide how best to allocate the new block-grant funds, with a minimum of federal restrictions. Rural interests are to be protected by requiring that 100% of the funds for programs formerly administered by FmHA and 70% of the funds in programs formerly earmarked for "small cities" in CDBG's must "pass through" the state to communities with fewer than 20,000 residents. Rural and urban areas will compete for most of the balance of funds under a new program.

As an innovation, some funds can be used to provide technical and management assistance to local governments.

Assistance to Local Governments

The President's Task Force on Regulatory Relief will search for ways of reducing federal regulations and reporting requirements in rural areas. The USDA will give advice to states that choose to create rural development information networks. A national Rural Resources Guide containing information on rural development will be published. The Bureau of the Census, the Bureau of Labor Statistics, and the Bureau of Economic Analysis will improve the quality and specificity of information collected and reported on rural areas.

Housing

A new program of rural housing block grants will distribute funds to states by a formula based on rural population, poverty, and extent of substandard housing. States will then devise means of promoting improved housing for low-income residents of rural areas.

Jobs and Income

Twenty-five rural "enterprise zones" will be designated nationally in response to state and local proposals for economic development projects. Various federal incentives (e.g., tax relief and reduced regulation) to private sector firms will be used to stimulate job creation in the designated zones. In addition, the administration will continue to promote foreign exports of rural products. The need for increased credit resources in rural financial institutions will be addressed by federal recommendations.

Difficulties in Implementation

The current policy expresses a philosophy of local self-determination in

the use of assistance from national sources. This contradicts and replaces the long-established pattern of federal leadership in rural development. It endorses a "grass-roots" philosophy of community development, with emphasis on local initiative, local control, and selective use of outside resources to achieve local goals. This assumes local capacity for effective collective action, given adequate assistance. To adopt a national policy without first proving this assumption is to place rural America in serious jeopardy of falling further behind in the competition for social and economic growth. There are major difficulties with this general approach and other difficulties with specific elements of the strategy that need immediate attention.

At a general level, a major difficulty is that many rural development problems result from forces that are beyond local or state control. There is little evidence, for example, that local efforts to promote economic development have more than a marginal effect on the geographic distribution of economic activities. Many of the problems of rural areas are regional and national in scope and cannot be resolved through local action alone. The commitment to local action in the national rural development strategy needs to be matched by the allocation of resources to attack the sources of problems at regional and national levels.

Particular elements of the national strategy present specific problems that need to be addressed as the strategy is implemented. For example, the consolidation of funds for rural facilities and services into a new program of block grants to states imposes a decision-making level (i.e., the state) between federal and local authorities; and the specific proposal reduces the proportion of program funds designated for small towns and rural areas. The flow of federal resources to rural areas is to be reorganized and is likely--in practice--to be reduced. Rural areas in many states have little power in state-level decision-making, yet this political influence is critical

if we are no longer to earmark funds for rural areas. Further, the amount of resources invested in development probably is the best single indicator of the amount of development that occurs. The areas with the most severe need for rural development assistance, as acknowledged in the strategy statement, are places with very small populations. Municipalities with only a few hundred or only a few thousand residents need special assistance in gaining access to a fair share of the available resources. Making funds "available" for communities under 20,000 does not necessarily guarantee that they will indeed be allocated to the small communities needing them. A safe prediction would be that without some targeting and directed technical assistance, a high proportion of such funds will find their way to communities on the upper end of the size scale and near urban areas. A better definition of "rural" obviously is needed to ensure that funds are allocated to the areas for which they are intended.

Housing grants and the creation of rural enterprise zones are the two major components of the new policy that clearly represent expansion rather than reorganization of the federal rural development effort. These initiatives address problems that are likely to be recognized as crucial from any perspective on the contemporary needs of rural America. The principal difficulties to be anticipated in the housing-grants program are those of assuring local as well as state participation in planning and decision-making and assuring that citizens with greatest need--poverty groups in relatively remote areas--are the major beneficiaries. Ideally, such a program would be part of a comprehensive attack on the economic and other problems that underlie the obvious need for improved housing.

The concept of rural enterprise zones as a means of increasing rural jobs and income, poses at least three difficulties. One is the fact that

development efforts will be focused in only a few of the many rural areas where jobs and income are lacking. As employment is the keystone of any rural development program, stimulation of increased employment in only a few selected areas could contribute to problems in others. For example, will these enterprise zones attract resources from other, equally deficient rural areas not so designated? In effect, will we be enriching one rural area at the expense of another? The second difficulty is that subsidized development in a selected area could prove to be of greater benefit to firms and persons outside the area than to its current residents. Action is needed to ensure that benefits will accrue first to local firms and citizens and that groups who cannot benefit directly will be protected from rising costs and other common problems of growing areas. The third problem is a question, perhaps best addressed through economic research, as to whether tax incentives and the like can have more than a marginal effect on creation of rural jobs, given the powerful effects of other factors that are not addressed by this policy.

Reduced federal intervention is likely to lead to reduced--rather than increased--chances of rural localities becoming or remaining viable social, political, and economic entities. National government is but one force, and probably a relatively weak one, influencing the economy and delivery of services in rural areas. The role of the federal government in the past has served to "balance" the market and interest-group influences impacting rural localities. As this role is reduced rural communities will suffer.

The difficulties identified in the strategy and the suggestions for implementation are presented not to challenge the governing philosophy of the policy but to draw attention to the need for a more comprehensive approach to rural development. The reality of the current situation is that growth in the national economy might occur, but without significant rural development.

Rural Development Policy

Jobs and income must be the initial foci of an effective rural development policy. A strategy that does not start with jobs simply does not start. The great transition in our rural economy over the past half-century was led by manufacturing growth in small towns and rural areas, with a parallel decline in agricultural employment. Today, we have a crisis in agriculture, the timber industry is experiencing major change, manufacturing is leaving the country and the rural crises of unemployment, poverty, and frustration are growing.

The rural economy is highly unstable. This is seen clearly in the two traditional rural industry categories (mining and agriculture) but also in the now-dominant category of manufacturing. If you want to help rural communities and rural services you have to help agriculture and manufacturing. As manufacturing employment declined in the northeast and Great-Lakes areas in the 1970s, many people from small towns and rural areas went west for the energy boom, arriving in Colorado, Montana, and Wyoming, for instance, in time for the energy bust. Where do they turn now? My view is that problems of coping with a bust far exceed the problems of coping with a boom, although the latter cannot be dismissed. A bust means no jobs or only marginal employment at best--an emerging pattern in many of our rural areas today.

In agriculture, the problems of instability are most pronounced among two groups--farm workers and relatively small family farms. It is now obvious that a vigorous program to promote off-farm employment in agricultural areas is needed if farm workers are to be able to rise above the abject poverty that characterizes their plight, and if small farms are to continue as the model of American agriculture. The great farming regions of this country face a monumental transition over the coming decades, as do the areas where mineral

and energy resources are the mainstay of rural economic life. Rural development to promote a diversified rural economy--with diversity as the chief defense against instability in particular industries--is essential if strong rural communities are to be developed and maintained.

Without diversified economies, rural communities have no basis for financing quality rural services which are the essential infrastructure for attracting new industries. People are forced to leave their communities in search of employment, and this tears apart the social well-being of small towns and rural areas. The need for improved services in rural areas has reached, in my estimation, a crisis stage. Space, low population density, and high levels of poverty combine to deny adequate levels of health care, child care, education, and related services to many rural Americans. Distance from urban centers increases the cost, and for many people it decreases the likelihood that services will in fact be delivered. Rural communities in a period of austerity face severe problems in providing police and fire protection, sewage treatment and disposal, and virtually the full range of other public services. In many small communities, increased demands for services in recent years have not been matched by an increased availability of resources to provide services. Consequently, public officials already face a crisis situation, and in many instances the solutions are not in sight--indeed, the solutions do not exist within the local area.

The Federal Role

Rural development, I believe, is everybody's business; and that makes it federal business. Reducing the gap between rural and urban areas on indicators of social well-being is in the general national interest. A concerted attack on multiple fronts is needed. We need rural initiatives in virtually all major agencies of the federal government to promote rural

economic development, improve rural services, attack inequalities, and stimulate community development. The continuing work in the U.S. Department of Agriculture is of vital importance, given, for example, the massive potential of our land-grant network for research and extension, a network with a presence in virtually all rural (and urban) localities. While coordination obviously is needed, major rural initiatives by other agencies also are important, because the problems and goals I have outlined here reach beyond the scope and mission of any single agency.

The federal role must be one of leadership: leadership in articulating a national rural development policy and leadership in providing the resources to sustain this policy. Otherwise, the forces that have contributed to these pressing rural problems will continue to restrict progress in rural development. State and local efforts are vital to the process of rural development, but these must be organized within a context of resolve and action at the national level. One of the most obvious facts of rural life in an essentially urban society is that many problems have their roots not in local areas but in the structure and functioning of the larger society. Rural employment, for example, is intimately connected to the national economic structure. Rural services are affected by organizations that operate in the larger society. Rural inequalities are rooted in nationwide inequalities. While rural areas have special needs that require special programs, many of those special needs require action at the national level. A major component of the federal role in rural development, therefore, should be one of national leadership in promoting changes that will have direct consequences for solving rural problems.

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Senator ABDNOR. Thank you, Mr. Christenson, for your points on our rural America.

Ms. Dunne, apparently Senator D'Amato knows of your ability and reputation even better than I do, and we are really happy to have you, and I was looking forward to your being on our panel.

So, we certainly welcome you and we are anxiously waiting to hear from you.

**STATEMENT OF FAITH DUNNE, ASSOCIATE PROFESSOR,
DARTMOUTH COLLEGE, HANOVER, NH**

Ms. DUNNE. Thank you. I think that in the interests of brevity I am going to abandon my prepared statement and just talk in summary form about what I have learned over the last 10 years during which I have devoted a large amount of my time to studying and writing about rural schools and rural communities all over the country.

I think I have learned two major lessons, one from the communities that I have studied and one from the people who have provided the funding for those studies.

The lesson I have learned about rural communities from living in them, from studying them, from working in them, is that they are wonderful places—even the places which are facing decline; even the places which are facing tremendous problems—have, by and large, a quality of community feeling that I have not found elsewhere, and I have lived in cities, and I have lived in suburbs, and I have lived—for the last 10 years—in a rural community.

Rural communities are different, genuinely different places, places which would be worth preserving even if they were not vital to the health of the Nation, which I believe they are—and I will talk about that a little bit later.

The second lesson I have learned is that the powerful people, the kinds of people who provide funds and who make policies, basically do not care about the rural communities. I can remember once many years ago calling NIE to find out about the fate of a proposal I had written. They said it was an excellent proposal but they de-

cided not to fund it because while the initiative was for women and girls and the problems of women and girls, there just were not enough rural women and girls to make it worth spending Federal dollars on them.

I said, "Well, there are 25 million of us," and the man at the other end of the phone said, "Well, yes, but that isn't enough," and that was it. So, those are the two things I have taken away, and they are the two things that seem to speak most to the problem that rural schools have. "Between a rock and a hard place" is certainly the problem of rural communities as they look at their schools.

Rural parents, rural communities, rural citizens, want the school to deliver the goods to their kids. They want their kids to get the kind of education that will allow them to pursue lives with options—whether they stay home or whether they leave. And large numbers of them will leave since the educated young is a major "export" of the rural community.

On the other hand, they want those goods delivered, by and large, at home, in the community, because the school plays a pivotal role in rural communities, a more important and more complex role than it does in metropolitan places. The school is frequently the central institution for a small rural town. In many places it is the social center for people who have no children remaining in the schools. It is the place where the kinds of ritual events that hold the community together take place, and it is therefore not only an educational institution but a community institution as well.

So that it is not "OK" with rural people to stick their kids on a bus and send them 2 hours away to get the goods delivered. They want the goods delivered in the place that welds their community together, that makes it a plausible place to remain in an increasingly urbanized and metropolitan country.

Now, there are ways to solve that problem, there is a way out from between the rock and the hard place. But it is going to take time, and attention, and money to get us there.

Rural schools need three general things: First of all, they need educational parity. They need the opportunity to deliver the skills, information, and concepts that metropolitan schools have. Before now, that has not been a possibility. You could not deliver the same goods in Towner, ND, that you could deliver in Newton, MA. But the technological revolution has made it plausible at last to create things in terms of curriculum, in terms of program, in terms of communication with kids in rural areas that have never been possible before.

It is today possible to deliver the entire contents of the New York Public Library to every small school district in South Dakota, and that is genuinely revolutionary.

It is possible to link kids to kids, kids to data sources, kids to experts in various fields in order to give them a larger classroom that has never been possible before.

It is also possible to deliver the goods by upgrading the quality of teachers in rural communities. A lot of work has been done in this area, I will not begin to go into it now. But it is possible to improve the quality of teachers, to turn around a major problem which is

facing rural schools right now: The drain of high quality teachers either into the metropolitan areas or into industry.

You talked about a "brain drain" in terms of kids, Senator Abdnor. In fact, the "brain drain" in terms of teachers is certainly happening and can be documented. The terrible scarcity of teachers that is about to face the Nation as a whole is already there in rural America.

Second, rural schools need to be protected. They need to be protected from the fact that it does cost more to deliver the goods in first-rate form to rural kids. A lot of fights go on about whether or not in fact it costs more to fund rural education than it does to fund metropolitan education. The answer is—if you are delivering equal programs—of course it does. You have fewer kids; you have higher transportation costs; you have other costs of isolation. That simply has to be accepted, faced, and compensated for if rural schools are to do the job that they want to do.

The second kind of protection rural schools need is protection from interfering legislation. The push for excellence has sent many state legislatures into full-tilt reform efforts. They are passing standardized legislation which is simply inappropriate for rural communities if they are to maintain their districts. Protection from the negative effects of legislation intended to bring about excellence has got to be built into the structure of State law and it will probably have to be done with the help of some funding from outside.

The third need that rural schools have if they are to be able to deliver the goods is the opportunity to develop a new perception of what good schooling is. The standard perception is a metropolitan one. It depends on very fine-tuned groupings of students, on major equipment outlays, on highly specialized teaching structures, on a lot of bureaucracy.

If you look at good schooling that way, rural schools are now, always have been, and always will be, deficient. If on the other hand we turn around our perception of what good schooling is and have two different models, one for rural places and one for urban places, then you can build on the extraordinary strength of rural schools and their communities and you can make rural schools uniquely rural and extraordinarily strong.

Essentially, the most important role that I see for these hearings and for the Federal Government is in some fashion to reorient the point of view of the powerful, to make sure that the people who make policies, the people who give out money, recognize that there is an absolute need and requirement to care about rural communities. And if they have no other reason, they ought to have this one: We have as a nation a deep-rooted economic interest in the vitality of our rural communities.

Metropolitan America has been well fed and well supplied with human and natural resources for so long that many people have forgotten where the food and the raw materials and the people are coming from. They are coming from rural America.

If the health of rural communities is threatened, the Nation as a whole is in danger. And if the maintenance of first quality education is pivotal both to the quality of the people who come out of

rural communities and the quality of the communities that remain, we have got to pay attention to what is going on in those schools.

Thank you for this opportunity.

[The prepared statement of Ms. Dunne follows.]

PREPARED STATEMENT OF FAITH DUNNE

Introduction

Mr. Chairman and the Committee: I am Faith Dunne, Associate Professor of Education at Dartmouth College. I have been invited here today, I presume, because I have spent the last ten years studying and writing about education and community life in rural America; most recently, I was the principal investigator in the first systematic national study of this country's smallest rural schools, and their place in the lives of the citizens they serve. I bring to this hearing a perspective different from either of the other panelists: I claim no expertise in the practical role of education in economic development, nor do I have the benefit of years of administrative experience in a particular community. What I have to offer is a national perspective, a sense of the common issues and prospects in rural schools across the country. It is from my research, my knowledge of the rural education literature, and--not incidentally--my ten years as a rural parent (six as a school board member) that I speak today.

Functions of Rural Schools

The rural school has a more complex role in community life than does its metropolitan equivalent. Like other rural civic institutions, the rural school serves multiple functions, and serves them under the close scrutiny of the citizenry. To understand the urgency of the needs of rural education, it is important to understand the school's multiple role.

First, like educational systems everywhere, the rural school serves an academic preparation function. The rural school must teach the community's young people both the basic skills and the advanced information and concepts which will prepare them to take their place in the modern world. This task is made more difficult for rural schools because they must prepare many of their students for an environment very different from the one in which they grew up. Metropolitan schools prepare the young, by and large, for life in metropolitan America. Most rural communities do not have the parallel option. They must instead serve as doorways to the urbanized world for the young people of their communities, since the educated young are still one of

the countryside's primary exports.

Second, the rural school often serves as the center of community activity. In small towns, the school is commonly the only shared civic institution; basketball games, FFA exhibitions, PTA pot-luck suppers and the like are the ritual events which maintain the community's sense of identity. In places which offer few options for social interaction, the school is a critical institution even for those who have no children there.

Third, the rural school is perceived by many citizens as the lynchpin of community survival, in both economic and political terms. Rural business people often believe that the closing of local schools will cut the ground out from under their town's economy, especially when that economy is already threatened by shopping centers in nearby metropolitan areas. Rural citizens often believe that the school is the only public entity over which they have a modicum of control, especially as increasing numbers of the decisions that shape their lives come from distant policy-makers and business leaders.

Schools are considered important to communities everywhere in America. But the multiple functions of rural schools make them even more pivotal in the minds and lives of the people they serve.

Critical Needs of Rural Schools

Rural schools have complex functions in their communities. They have concomitant needs which must be met if they are to serve their functions well in a national society which is increasingly interdependent and increasingly demanding of its participants.

Need 1: Parity

Rural schools must achieve instructional parity with metropolitan institutions if they are to provide children with the skills, information, and concepts required for life in a complex, technological, mobile society. This parity must include equal access to instructional resources and to competent teachers.

This is not a simple task, but it is now a manageable one. Traditionally, it has been impossible even to think about providing equal resources to places as different as Newton, Massachusetts and Towner, North Dakota. Now, for the first time, technology makes reasonably equivalent access plausible. Microcomputers, linked by

modems, can give rural students isolated in the vast wheatfields of Eastern Washington the opportunity to learn from major data bases, from university and laboratory-based experts, and from each other. Videodiscs have the potential to make the New York Public Library available to every rural high school student in the North Maine woods. Interactive technology can teach Japanese to a high school sophomore in rural Alabama. Microcomputers with appropriate peripheral equipment can simulate aspects of a Cal Tech physics laboratory in a sandhills high school in Western Nebraska. For 100 years, those seeking high-powered instruction could only find it in the metropolitan areas. This is no longer true. The recent developments in technology provide a basis for genuine revolution in rural schooling.

Equipment alone, however, will not do the job. The 1960's dismal efforts to produce "teacher-proof" curriculum established, once and for all, I hope, that who is in the classroom is as critical as what is there. Rural schools have particular problems with staffing, which must be addressed aggressively if they are ever to be resolved.

Teacher shortages, which are about to reach critical proportions nationally, have already struck rural areas. Rural schools have always had difficulty attracting well-prepared, highly competent teachers. The pay is better in metropolitan areas, as are the opportunities for professional stimulation and advancement. It is the assumption of rural administrators--usually based on years of experience--that they will lose their most talented young teachers within three to five years. In states where there are competitive demands from outside the school system, the problems are even more acute. In New Hampshire, for example, where there is well-developed high tech industry, rural schools find it almost impossible to retain first-class math and science teachers. The best teachers in the industrialized, metropolitan southern part of the state are siphoned off into industry. The best teachers from the rural north country move south to fill those jobs. And the students in the more isolated communities are left with underprepared and sometimes inadequate instructors. This pattern is repeated, in various forms, across the nation.

Three initiatives would address this perennial and increasingly pressing problem. First, we must find ways to retain competent teachers in rural classrooms, and to enhance their competence. Rural teachers who lack a cohort of accessible colleagues need greatly enriched, readily available opportunities for professional development. Again, technology promises new possibilities. The Northeast Regional Exchange (NEREX) has designed experimental programs for Vermont and

New Hampshire which link rural science and math teachers preparing to teach outside their major fields with experienced teachers and experts in their new subjects. Refresher (and introductory) work can also be delivered by interactive networks, as well as via videodiscs.

More than technology is required, however. Teachers need human contact in addition to computer hook-ups. Rural teacher especially need the opportunity to meet with others who face similar problems and share similar resources. "Circuit rider" conferences, tailored to the specific needs and interests of rural teachers could augment technological opportunities, and would allow practitioners to build both an area-wide network and a common, positive vision of the future of rural education.

Even if these efforts succeed in retaining more competent people, we will still need to find ways to recruit a larger share of the best new teachers for rural schools. The vast majority of America's teachers are prepared in essentially suburban places for essentially suburban teaching environments. If effective rural teachers are to be prepared, they will need training for the particular strengths and problems of country schools. There are several ways to do this. Rural sites for training teachers have shown considerable promise. The programs at Brigham Young University and Kansas State have shown that structured and supervised training in rural settings makes many young teachers more eager for the challenges offered by country schools and more competent to meet them. In other places, school-based teacher preparation programs have proved to be good mechanisms for tapping the talents of adults already committed to life in a local rural region; New Hampshire's Upper Valley Teacher Training Program is one example of a school-based credentialing program which has produced a sizeable, stable cadre of teachers for the Connecticut River Valley communities it serves.

Retention and recruitment strategies such as these will do the job in some rural places. But in more isolated, or less obviously attractive places, financial incentives will need to be employed. It is probably not necessary to offer additional pay to teachers in Stowe, Vermont, or Hilton Head, South Carolina. But Alligator, Mississippi and Colebrook, New Hampshire need their share of high-quality instruction also, and financial incentives may be the only way to keep a reasonable number of their good teachers from the arms of industry, or at least from the pull of the metropolitan schools. In 1979, when I was in Finland, the teachers in remote Kuusamo were shocked when I told them that the United States did not pay its isolated rural teachers more than its

suburban instructors. "How can you possibly get any reasonable people to remain?" they asked. I was hard pressed to give a good answer.

Need II--Protection

Rural schools need to be protected. Sometimes this kind of protection costs money; sometimes it requires policy flexibility. These needs tend to be an inevitable concomitant of a decision to safeguard any scarce and valuable resource, but that connection is not easily made among those who form policy for rural education.

Two kinds of protection need to be offered to rural school districts. The first is protection from the results of unequal costs incurred when a high-quality education is offered to small numbers of students. There have been many arguments, over the years, about whether rural schools (especially small ones) cost more than large, metropolitan ones. The answer is, of course they do--if they offer equal programs. There are substantial savings which can be realized if rural schools organized around their strengths--structuring programs, for example, around the tendency of rural schoolchildren to work well in mixed ability groups, instead of hiring several teachers to teach different levels of the same course. But the fact remains that smaller numbers of children, higher transportation costs, and the need for sophisticated technology to create curricular parity will make the per-pupil expenditures higher in rural areas than in metropolitan ones. The customary state aid formulae must be adjusted to meet this reality, or compensatory funds must be provided by the federal government.

The amount of additional money this will cost will vary with the level of another kind of protection: protection against the destructive effects of school reforms intended to achieve educational improvement. The current spate of legislation designed to meet the challenges of the various commission reports tends to set up uniform requirements for schools, no matter where they are or what their resources. Further, the new laws generally take the form of input specifications rather than output measures. That is, schools are required to establish new courses and new programs rather than to produce evidence that their students have achieved certain essential skills. This approach may appeal to metropolitan districts (where it is often easier to set up new courses than it is to achieve new levels of student achievement). But it simply will not work in rural areas which have neither enough.

personnel nor enough students to make this strategy reasonable. Further, even with the aid of technology, rural schools are unlikely ever to meet very detailed and precise standards. Intrinsic to the sense of educational ownership so important to rural citizens is the ability to make local decisions about educational priorities. State legislatures must be convinced that building flexibility into new standards is crucial to maintaining this important sense of ownership, and thus to the the health of their rural areas. Standards must be maintained, for the general good; but they must allow for critical differences between rural and metropolitan places.

Provision for Development

None of the suggestions I have made so far can be implemented effectively unless educators and rural consumers of education begin to think about rural schools in new ways. The conventional model of "good" education is metropolitan. It depends on staff specialization, elaborate equipment, and fine-tuned student groupings. By the terms of this model, rural schools are perpetually deficient. Conventional rural school reform has tried to compensate for these deficiencies by providing ways of miniaturizing metropolitan practices in rural settings. The results are sometimes ludicrous--my favorite is the Iowa architectural drafting class of four, which sat in two rows of two in the middle of a classroom, watching (or rather not watching) a teacher do a demonstration on an overhead projector.

Even when the outcomes of miniaturization are not overtly silly, they are still inappropriate for rural schools. Rural educators need to work for improvement within a model suitable to rural conditions, a model which assumes that rural schools are different rather than deficient. The "difference" model builds on the strengths of small size and long-term association among participants, uses the rural environment as an instructional resource, adapts modern technology to meet the problems of cultural and physical isolation. This model exists, in bits and pieces, in schools, universities, research and development laboratories across the country and around the world--especially exciting work has been done in Alaska and in Australia, where the law requires the support of effective education in very small, very rural schools. But it has never been put together in a fashion coherent enough to be communicated effectively to rural schoolpeople predisposed by their training to believe in the

metropolitan model of good schooling.

To encourage the development and dissemination of the "difference" model, the federal government will have to provide resources which will give incentive to universities, labs and intermediate agencies to turn their attention to this work. I specify the federal government because it seems the only likely source of support for such a broad-sweeping effort. State-based development will continue the piecemeal pattern. Major private foundations do not tend to take rural education issues seriously enough to support a large-scale effort. A national initiative will have to be undertaken on federal funds.

It is important to note, however, that an adequately supported research and development program is likely to result in long-run educational savings. Rural school programs developed in concert with rural strengths are more likely to be economical and efficient than those based on the assumption that grave weaknesses must be corrected before positive educational growth can even begin.

Reasons to Maintain Rural Schools--Why Bother?

Clearly, the recommendations I have outlined here are neither cheap nor easily achieved. In a nation where 75 percent of the population lives on 3 percent of the land mass, one might well ask, why bother? And, indeed, federal and state policies often appear implicitly based on a negative response to that question. I see, however, at least three powerful, positive responses.

First, we, as a society, need to recognize the general entitlement of a large segment of our population to the maintenance of their own communities and their own ways of life. Sixty-million people live in rural America, fourteen-million of them schoolchildren. If they want to offer their children a first-rate education, while also keeping their community schools, they ought to be able to do so. They are not a population whose needs can be legitimately ignored.

Second, we, as a political entity need to recognize the importance of maintaining our rural-metropolitan balance. In many countries, from Scandinavia to Africa, governments try (often vainly) to keep a reasonable segment of their population in the rural areas. This has not been a major problem in the United States for a variety of historical and economic reasons. Although, as sociologists Luther Tweeten and Daryl Hobbs have pointed out, workers have been a

chief export of rural places for more than a century, there have always been enough people who have chosen to remain in the country to maintain a national balance. If that balance is threatened--as it has been by the farm credit crisis, and by the decline in family farming, and by the increasing pressure to close down local community schools--the entire national balance is threatened. One look at the problems posed by overburdens on metropolitan areas in other countries ought to tell us that an investment of resources in the health of rural America now will have a long-term payoff which will be economical indeed.

Finally, we, as a nation must recognize our deep-rooted economic interest in the vitality of our rural communities. Metropolitan America has for so long been well-fed and well-supplied with both natural and human resources that many people have forgotten where the food, the raw materials, and the workers come from. They come from rural America. If the health of rural communities is threatened, the nation as a whole is in danger.

We have learned from our agricultural practices and from our patterns of resource extraction that we cannot continually take from the land without providing for its renewal. It is time to apply these lessons to rural education. Metropolitan American has received great wealth from rural communities. If it is to continue to derive these benefits, some return must be paid at this crucial time. Rural schools, pivotal to the strength of rural life, must be supported and enhanced. For the good of the nation, we must make an investment in keeping rural schools community-based and instructionally strong.

Thank you for giving me this opportunity to discuss the prospects and problems of rural education with you this morning. I hope that my perceptions augment your broad assessment of the condition of rural America today and in the future.

Senator ABDNOR. Thank you. Thank you for that fine testimony. Our next witness is Mr. Paul Delargy from the Center for Community Education, the University of Georgia. We welcome you to our panel this morning.

STATEMENT OF PAUL DELARGY, DIRECTOR, CENTER FOR COMMUNITY EDUCATION, UNIVERSITY OF GEORGIA

Mr. DELARGY. Thank you. In the interest of my colleagues and time, I will try to cut my remarks short and depart from the text.

It is a pleasure and welcome opportunity for me to be able to be with this subcommittee and share some thoughts and concerns about rural America. In my opinion, we can no longer respond to problems of rural America as jellyfish respond to the environment, controlled mostly by shifting winds and the action of the tide. In this complex world of nations which become more independent each day, it is foolhardy not to have a national rural policy other than a "no policy" policy for all practical purposes.

I say this in spite of my awareness that many people equate our farm policy to what they perceive is our rural policy. It is my opinion that many of the urban problems are merely extensions of rural problems, and until we decide to concern ourselves seriously with solutions to the major rural problems, we will be faced with never solving the second and third generation problems they produce.

The attitudes of many, including the rural residents themselves, have traditionally characterized rural folks as bumpkins, rednecks, hicks, et cetera, which by definition describe less than a first-class citizen. I am reminded of a true story of a professional dentist who lived in Minneapolis who was arrested and convicted for arson. As his punishment, the judge sentenced him to 2 years of community work in a small rural community. Arson is a serious crime and to some being sent to a rural community represents a serious punishment. It is my opinion that attitudes such as these are what keep us from seriously attacking rural problems.

In addition to the negative attitudinal problems toward rural America, the prevailing thoughts that bigger is better, the consolidation and specialization are the answer, all work negatively when overused in rural communities. It would be wise for us to consider some alternatives such as, small is beautiful, decentralization, and the development of generalists. Some of this thinking would be much more appropriate for many small and rural schools.

If we look at trends over the last 10 years, there is some reason for encouragement. Let me just cite a few: According to Naisbitt, we are moving away from an industrial society to an information society. We are moving away from a centralized society to a decentralized society, and the list goes on and on. But finally, we are moving from a vertical society to a horizontal society, to mention a few.

If these trends are a fact, we can have the basis for a strong case for the encouragement of rural development with an indicator reversal of the things we normally think of as urbanization. Each of these trends suggests interesting and encouraging possibilities for rural America.

Why can we not move from the specialist movement that all too soon becomes obsolete to the generalist movement of people that can adapt? Traditionally, the rural person who succeeded many times was a generalist who was flexible. People in rural communities know their neighbors. Do we not need to foster strong interpersonal relationships to counter the high technology and to go along with what the previous speaker talked about in terms of the ability of technology to be very, very helpful to rural communities?

Do not rural communities in fact offer great opportunities for the high touch to combine with the high technology?

Because of time constraints, I am going to skip over some things.

One-third of the population of America is rural, and in my State of Georgia one-third of our population, approximately 2 million people, are rural people. This is no small minority. Yet because of the traditional traits of rural people of being independent and because of the low density of population, rural people have done little to become effective in obtaining their share of the resources necessary to maintain a high quality of life.

When we compare the quality of education, health, housing, transportation, and income, it becomes apparent that generally people in rural America have a lower level of quality of life.

Because this subcommittee is concerned with resources, I would like to present some thoughts regarding rural people which represent a major resource and the natural resources as they relate to rural America.

All too often, rural people are deprived of educational opportunities equal to those available to nonrural people. Rural schools nationally have higher dropout rates, lower achievement of scores, and lower paid personnel. Is it not interesting that of the 25 industrial nations the United States is the only industrial Nation that pays its rural teachers less than its urban teachers? In Norway, an elementary school in rolling over 450 students becomes disqualified for State support, whereas in the United States the educational infrastructure is designed to reward bigness. More and more evidence supports an ideal number of 400 or less for elementary schools, and perhaps a high school of about 1,200.

In my opinion, there is no better objective for this subcommittee than to pursue a course to enhance the quality of education in rural America because education can be the most valuable investment for the development of rural America's greatest asset, people. Please note, however, that my recommendation does not endorse more of the same. I strongly suggest that we look at rural schools and a rural life-long learning process without the assumption that the present urban-industrial model is adequate. It is not. It has not been doing well in the urban areas, so why should it succeed in rural situations?

Let me just tie into these comments the fact that many rural areas have a wealth of raw materials and natural resources which are not used in a way to give the rural areas where they exist maximum benefits for their value. Are we not all aware of all too many examples of rural areas where the people who are fortunate enough to have jobs at all, have the lower-level jobs, and outsiders seem to fill most of the management jobs?

Are we not all aware of all too many examples of rural areas where the raw natural resources are consumed with little benefit to the local communities or, in many cases, little benefit within the State? Offhand, I can think of one example where 70 percent of the value of coal extracted from an area goes outside the state and the enterprise pays little relationship to what it takes from the community in terms of supporting the community and supporting the community's education.

With these two elements in mind, better education and better utilization of local resources, I would like to suggest one specific strategy, one possible way or partial solution to rural economic development:

I would like to recommend the use of school-based development enterprises for rural communities. School-based development enterprises provide a way to link education with rural economic development by creating environments which include local high school students in small business development. They provide students with an opportunity to conduct feasibility and marketing studies; to develop business plans, and to implement and develop and establish small businesses. They maximize the potential of local people to have control over their economic development and to become more than just lower-level employees.

School-based enterprises should seek to obtain maximum value of local resources. School-based enterprises simply are businesses formed to meet local needs. They provide services and products needed by the community. They can provide jobs for youths and, at the same time, provide realistic opportunities for training entrepreneurs. These potential entrepreneurs in turn use this training as small business operators to establish small businesses where need is indicated.

There is ample evidence to indicate that the future of rural America is far more promising if we develop many small businesses rather than to depend on bringing in giant industrial dinosaurs.

I would like to mention, in the State of Georgia we have a \$52 million support system for 35,000 farmers. We have a \$3 million support system for over 125,000 small businesses, many of them in rural areas. The resources are not being used, I think, in an adequate way to support where the needs are.

School-based development enterprises, when properly developed, can improve the quality of life in rural America; develop entrepreneurial talent locally; provide youths with jobs; decrease dropouts; increase school attendance; create better self-images and attitudes and offer a pragmatic, exciting process of education for students and the rural community.

I appreciate this opportunity to share some thoughts with you today. I understand that a strong effort on the part of all of us—especially this subcommittee and Congress—will be required to bring about the change so essential in rural America. Thank you. [The prepared statement of Mr. Delargy follows:]

PREPARED STATEMENT OF PAUL DELARGY

It is a pleasure and a welcome opportunity for me to be able to share with this committee some thoughts and concerns about rural America. In my opinion we can no longer respond to the problems of rural America as jelly fish respond to their environment -- controlled mostly by shifting winds and the action of the tide. In this complex world of nations which become more interdependent each day it is foolhardy not to have a national rural policy other than a no-policy policy for all practical purposes. I say this in spite of my awareness that many people equate our farm policy to what they perceive as our rural policy.

I am by professional training an educator and economist and have spent most of my professional career, by choice, involved with small or rural communities. It is my opinion that many of our urban problems are merely extensions of rural problems. Until we decide to concern ourselves seriously with solutions to the major rural problems, we will in fact never solve the second and third generation problems which they produce.

The attitudes of many, including rural residents themselves, have historically characterized rural folks as bumpkins, red necks, hicks, etc., which by definition describe less than a first class citizen. I am reminded of a true story of a professional dentist who lived in Minneapolis and who was arrested and convicted of arson. As his punishment the judge sentenced him to two years of community work in a

small rural community. Arson is a serious crime, and to some, being sent to a rural community represented a serious punishment. It is my opinion that attitudes such as this are what keep us from seriously attacking rural problems.

In addition to the negative attitudinal problems towards rural America, the prevailing thoughts that "bigger is better" and that consolidation and specialization are the answer all work negatively when overused of rural communities. It would be wise for us to consider some alternatives such as "small is beautiful," decentralization, and development of generalists. Such thinking would be much more appropriate for many small or rural communities.

If we look at trends over the past ten years, as described by Naisbitt, there is some encouragement. Let me cite a few of these trends. He states that we are going from: an industrial society to an information society, a centralized society to a decentralized society, economics of scale to appropriate scale, a managerial society to an entrepreneurial society, resource exploitation to resource conservation, institutional help to self help, conquerors of nature to partners with nature, and from a vertical society to a horizontal society, to mention a few. If these trends are a fact, they can be the basis for making a strong case for the encouragement of rural development for they indicate a reversal of urbanization. Each of these trends suggests encouraging possibilities for rural America.

Don't we need to move from the specialist who too soon is obsolete to the generalist who can adapt? Traditionally the rural person who succeeded many times was a generalist who was flexible. Why impose specialization?

People in small rural communities know their neighbors. Don't we need to foster strong interpersonal relationships to counter high technology, and don't rural communities offer great opportunities for both?

Because of time constraints I'll forego further generalization and get more specific.

One-third of the population of America is rural; approximately one out of three Americans is a rural American. This is no small minority, yet because of the traditional traits of rural people to be independent, and because of a low density of population, rural people have done little to become effective in obtaining more of their share of the resources necessary to maintain a high quality of life.

When we compare quality of education, health, housing, transportation, and income it becomes apparent that generally people in rural America have a lower level quality of life.

Because this committee is concerned with resources, I would like to present some of my thoughts regarding rural people, who represent a major resource, and natural resources as they relate to rural America.

All too often rural people are deprived of education opportunities equal to those available to non-rural people. Rural schools nationally have higher dropout rates, lower achievement

scores, and lower paid personnel. Isn't it interesting that of the twenty-five industrialized nations, the United States is the only industrialized nation that pays its rural teachers less than its urban teachers? In Norway an elementary school enrolling over four hundred and fifty students becomes disqualified for state support whereas in the United States the educational infrastructure is designed to reward bigness. More and more evidence supports an ideal number of four hundred or less for elementary schools and perhaps a high school of about twelve hundred.

In my opinion there is no better objective for this committee than to pursue a course to enhance the quality of education in rural America, because education can be the most valuable investment for the development of rural America's greatest asset--people. Please note, however, that my recommendation does not endorse more of the same. I strongly suggest that we look at rural schools and a rural life-long learning process without the assumption that the present urban/industrial model is adequate. It is not. It is not even doing well in urban areas, so why should it succeed in rural situations?

Now let me tie into these comments the fact that many rural areas have a wealth of raw natural resources which are not used in a way to give the rural area where they exist the maximum benefits from their value.

Aren't we all aware of all too many examples of rural areas where the people who are fortunate enough to have jobs work at all have lower level jobs, and outsiders seem to fill

most of the management jobs? Aren't we all aware of all too many examples of rural areas where the raw natural resources are consumed with little benefit to the local communities and in many cases little benefit within the state? Off hand I think of one example where 70% of the value of coal extracted from an area goes out-of-state, and the enterprise pays little in relationship to what it takes to support education.

With these two elements in mind--better education and better utilization of local resources--I would like to suggest one specific strategy for providing a partial solution for rural economic development. I would recommend that the use of school-based development enterprises for rural communities.

School-based development enterprises provide a way to link education to rural economic development by creating environments which involve local high school students in small business development. They provide students with opportunities to conduct feasibility and marketing studies, develop business plans, and implement development and establishment of small businesses. They maximize the potential of local people to have control of their economic development and to become more than just lower level employees. School-based development enterprises should seek to obtain maximum value of local natural resources.

School-based development enterprises simply are businesses formed to provide for local needs. They provide services or products needed by the community. They can provide jobs for youths and at the same time provide realistic opportunities for

training entrepreneurs. These potential entrepreneurs can in turn use this training as small business operators to establish new small businesses where need is indicated.

There is ample evidence to indicate that the future of rural America is far more promising if we develop many small businesses than if we depend on bringing in giant industrial dinosaurs.

School-based development enterprises, when properly developed, can improve the quality of life in rural America, development entrepreneurial talent locally, provide youth with jobs, decrease drop outs, increase school attendance, create better self-images and attitudes and offer a pragmatic, exciting process of education for students and the rural community.

I appreciate this opportunity to share some thoughts with you today. I understand that a strong effort on the part of all of us --especially this committee and Congress --will be required to bring about the change so essential in rural America.

Senator ABDNOR. Thank you, Mr. Delargy. All this input is extremely valuable to us.

I know you will find our next witness equally qualified, Mr. Cockle of Watertown, SD, where he is superintendent of schools. He built an excellent institution in his tenure there. He particularly has done great things for South Dakota vocational education. As I recall, 20 years ago there was a lot to be desired in vocational training. But because of the pioneering and hard work of Mr. Cockle, we can be quite proud of our program. He has done much for our State also, I might add, in other areas of education.

But I am really pleased to have you here today, Mr. Cockle.

**STATEMENT OF ROBERT COCKLE, SUPERINTENDENT,
WATERTOWN PUBLIC SCHOOLS, WATERTOWN, SD**

Mr. COCKLE. Thank you, Mr. Chairman and panel members. I have served 37 years as superintendent of schools in school districts ranging in size from 300 to 4,500 students. For the past 17 years, I have been the superintendent of schools in Watertown, a city of some 18,000 with approximately one-third of our school students coming from the rural area and two-thirds from the city. In addition to the K-12 public schools, the school district operates a postsecondary vocational training institution of some 1,000 students in 28 programs grouped into agriculture, health, industrial, and business training.

The major emphasis of our K-12 program is to teach the basics at the elementary level, explore and reinforce at the junior high level, and prepare further for life's work at the senior high level. In our State of South Dakota we have this opportunity. It is a fine place to live and work.

However, all of the above is based on the premise of agriculture playing the dominant economic role that it has in the past. Existence of the family farm, the need for manual labor in the process of agricultural production, the need for small towns scattered throughout the agricultural communities to provide services and the needs of a transportation system are completely different today. Change has not been abrupt, like all social changes, it has varied with the Nation's economy, weather, world economy, new technologies.

My dad happens to be 91 years old. He was visiting at Christmas time, about the time everyone was excited about the rural economy. He listened to us all talk about it for a while and finally he said—he has been retired, by the way, for 30 years—"Bob, what is new? Back in 1927, I went broke on a farm and had to find a different occupation."

Well, he went back to reading his paper and the rest of us worried about our present conditions. But it is not new. I mean, things do change all the time.

Change has not been abrupt, like all social changes, it varied in many ways. Today, as a reflection of this change, however, I am here to testify that while the Nation as a whole is prospering, the rural economy is not participating in this prosperity.

Agriculture will always play a large role in our Nation. Technology, however, has changed the role that people play in agriculture.

As less people are needed in current agricultural production, our rural States have several alternatives.

One, we can accept the fact that less people will be directly involved in agriculture and in the attendant agricultural service areas.

Two, we can more intensively produce grain, fiber, and meat products, therefore employing more people and giving our Government even a larger problem.

Three, use the human and natural resources available to diversify the dependence on basic agricultural economy to one that includes business, manufacturing, processing, and agricultural production.

No doubt, the answer lies in diversification in some way, manner, shape or form. While our natural resources may be limited to space, water, climate, and way of life, these very items have become important. Transportation is not a major factor. Access to vast quantities of raw resources has become less important. The need to be near a large market has lessened due to technological advances, and the new communication developments have changed the isolation factor.

The question of diversification leads to the question of skilled people for industries, business and manufacturing. As an agriculture dependent area, the emphasis of skill training has been in agriculture-related fields at this time. The alternative was the professions. The Midwest has always provided an exportable number of trained professionals to the Nation. The new thrust, however, must be to produce the trained technicians, the skilled workers, and the professionals in the areas of management, engineering, and production. We are going to have to compete with the rest of the world, and the only way we will ever compete is with more skilled training, more skilled people, and more skilled professionals. This calls for a new and different emphasis on our education and training programs at the secondary, post-secondary, collegiate, and adult levels.

Rural people are accustomed to hard work, long hours, and low salaries. They are appreciated throughout the Nation when applying for work. Their work ethic, independence, natural acceptance of responsibilities gives them priority. However, when new businesses or industry move to a rural area, they not only must have good workers, they must have skilled workers. To have skilled workers, there must be skilled workers training programs. This is what we have attempted to do at our postsecondary vocational technical institute in Watertown. We have been relatively successful, the city having acquired some 28 new businesses or industries in the past 5 years, providing some 1,800 new jobs.

In the 1950's, the only vocational education programs in our area were in the fields of homemaking and agriculture. Less than 250 students in South Dakota per year were actively engaged in training for skills in trade, industry, or health occupations at the post-secondary level. The dependence on agriculture as the sole employer was apparent.

Post-secondary vocational technical training institutions were established in conjunction with the manpower development training programs at that time. This led to the establishment of vocational

technical institutes located geographically in the State. They have been successful. However, the vocational technical programs tended to follow the policies of higher education and were soon based on the semester, the college calendar, the summer vacation. Nevertheless, significant expansion has occurred.

The new thrust in Federal vocational funding is to emphasize new technology, create new programs better suited to the information age. It is gratifying to see that the Education Department and Labor Department are once again working together trying to upgrade skill training through such programs as the Joint Training Partnership Act. It is the need for cooperation between industry, labor, and education that can bring back our strong industrial base and help us as a Nation compete with less costly foreign labor.

Education, but particularly vocational training, needs a new approach. For too long, vocational training has been modeled on the academic college model. We need to transfer to the industry image of training. It should be competency-based training, individualized, and with an open entry, open exit possibility. Training should be when needed, not when convenient to offer. It should be individualized. No two people learn at exactly the same rate. It should be competency based so an employer knows, on an application, exactly what an employee can do and in which skills he is competent.

The secondary vocational technical training should fit into the postsecondary just as the secondary academic program fits into the postsecondary academic education. Again, the vocational training must be available throughout an employee's lifetime. Successful Japanese companies now provide their employees training while all the time they are employed. This should be carried on by our industry, but also by our vocational training institutions.

Putting all of America back to work—the urban, the rural, the industrial, and the agricultural—is the goal. Competition in the world market is a fact. Training and education will make or break a nation.

Maybe I should say this, I do not think we need necessarily more Federal funds for the projects such as this. Federal funds are available through both the Education Department and the Labor Department. However, we do hope we can take the available Federal moneys, add to them the State and local funds, and put these moneys to work in a way that, as our economy changes, we can change. Technology, special skills, basic education and the opportunity to use talents in the best way is the goal. To do this, we need an organized program incorporating business, manufacturing, labor, and education.

I guess the way that I might suggest a solution to it is that the original Vocational Act of 1963 was implemented to provide skill training to future employees and industry. The funding came to the educational institutions such as public school districts, special vocational school districts, colleges or universities, or community colleges. None of these people really understood the need of industry and labor for skill training—they were educators.

Therefore, the vocational education's moneys were most often used to provide an alternative for students who did not like academics but wished to be in a school or college setting. This has existed and grown for the past 20 years. The Department of Labor

has had to develop their own skill training programs because educator developed programs were not suited to train basic labor needs. CETA, JOBS, ADC were some of the Labor Department added programs. Again, we had education, industry, and labor at odds over skill training.

Labor wants skill training for job placement. Education wants skill training for technical education and often serves it in a typical collegiate model. Fortunately, there is opportunity—as I mentioned—through the JTPA Program, the new Federal Vocational Act, to put these two together and make the training the type that both labor and industry and business need.

To do this, we again have to turn to technology. We have the computer. This probably is the one thing that is going to make it possible, by the use of interactive video, computer-managed instruction, computer-assisted instruction, computer-based instruction, to teach the individual training and skills to students according to their needs, their ability, their knowledge, and their motivation.

Again, this is a transportable situation, you do not have to go to a large college or university, or a central location, to have it.

In the past, we have placed people in classes of 15 to 20, worked with them as a group, lectured as a group, and graduated as a group. While there were 15 to 20 individuals, each with varying abilities, we taught all 15 to 20 at the same pace with the same material. The computer can free an instructor from this artificial environment. It makes possible the individualized training.

As an educator interested and involved in both academic and skill training, to me we have an opportunity for the greatest change since the beginning of history. We are entering a period of time where due to technological advancements, creative thinking, industrial competition between nations, the motivation of a declining economy, and change in education procedures, educators will be forced, placed, and dictated to make change.

The concept of individualized educational programs for each learner is within reality.

A unified plan from this Congress, utilizing moneys being appropriated for bits and pieces, through labor, education, welfare, health and associated agencies, needs to be developed.

The development of a consensus of the need for skill training for every member of our society is needed. Our business and industry must have better skilled employees to compete with foreign labor.

As the economy of an area of our Nation changes as it has in the agricultural section, there must be a method to retrain and upgrade the work force to new and needed skills.

[The prepared statement of Mr. Cockle follows:]

PREPARED STATEMENT OF ROBERT COCKLE

Panel - Education

I am from South Dakota, and representing the midwest states. South Dakota has some 1,000,000 square miles, a population of 650,000, with a rural, strongly agricultural based economy. I have served 37 years as Superintendent of Schools in school districts ranging in size from 300 to 4500 students. For the past seventeen years I have been Superintendent of Schools in Watertown, South Dakota, a city of some 18,000 people with approximately 1/3 of our school students living in the rural area and 2/3 in the city. In addition to the K-12 public schools the school district operates a post-secondary vocational training institution of some 1000 students in 28 programs grouped into Agriculture, Health, Industrial, and Business Training. The Lake Area vocational Technical Institute was started in 1966 under the Vocational Act of 1963.

The major emphasis of our K-12 program is to teach the basics at the elementary level, explore and reinforce at the junior high level and prepare further for lifes work at the senior high level. In our State of South Dakota we have this opportunity unshackled by the restraints of the problems of urban unres., minority and cultural differences, or general poverty. South Dakota and the midwest is a fine place to live and work.

However, all of the above is based on the premise of agriculture playing the dominant economic role that it has in the past. The existence of the family farm, the need for manual labor in the process of agricultural production, the need for small towns scattered throughout the agricultural communities to provide services and the needs of a transportation system are completely different today. The change has not been abrupt and like all social changes it has varied with the nations economy, the weather, the world economy and new technologies. Today, as a reflection of this change, I am here to testify that while the Nation as a whole, is prospering, the rural economy is not participating in this

prosperity.

Agriculture will always play a large role in South Dakota and our nation. Technology, however, has changed the role that people play in agriculture. At one time it was estimated that it would take one person employed in agriculture to produce food for ten others. This proportion has dramatically risen to one agricultural producer for fifty and will go higher. As less people are needed in current agriculture production our rural states have several alternatives.

1. Accept the fact that less people will be directly involved in agriculture and in the attendant agricultural service areas to maintain production. Population will be reduced, but an economy maintained.
2. More intensively produce grain, fiber and meat products, therefore employing more people. This will produce greater quantities of food to better feed a hungry world. It will employ more people. However, a market must be created for the additional products.
3. Use the human and natural resources available to diversify the dependence of a basic agricultural economy to one that includes business, manufacturing, processing and agricultural production. This will retain people in the state and may even add people.

No doubt the answer lies in diversification in some way, manner, shape, or form. While our natural resources may be limited to space, water, climate, and way of life, these very items have become very important. Transportation is not the major factor it once was. Access to vast quantities of raw resources has become less important. The need to be near a large market has lessened due to technological advances, and the new communication developments have changed the isolation factor.

The question of diversification leads to the question of qualified people for new industries, businesses and manufacturing. As an agricultural dependent area, the emphasis of education has been in agriculturally related fields. The alternative was the professions. The

midwest has always provided an exportable number of trained professionals to the nation. The new thrust however, must be to produce the trained technicians, the skilled workers, and the professionals in the areas of management, engineering and production. This calls for a new and different emphasis on our education programs at the secondary, post-secondary, collegiate and adult levels.

Rural people are accustomed to hard work, long hours and even low salaries. They are appreciated throughout the Nation when applying for work. Their work ethic, the independence, and the natural acceptance of responsibility gives them priority. However, when new businesses or industries move to South Dakota they not only must have good workers they must be skilled workers. To have skilled workers there must be skilled workers training programs. This is what we have attempted to do at our post-secondary vo-tech institute in Watertown, South Dakota. We have been relatively successful, with the city having acquired some 28 new businesses or industries in the past five years and providing some 1800 new jobs.

In the 1950's the only vocational education programs in South Dakota were in the fields of homemaking and agriculture. Less than 250 students per year were actively engaged in training for skills in trades, industry, or health occupations at the post-secondary level. The dependence on agriculture as the sole employer was apparent and state-wide efforts conducted to encourage industrial expansion. Post-secondary vocational technical training institutions were established in conjunction with Man Power Development Training programs and the Office of Education. This led to the establishment of vo-tech schools located geographically in the state. These programs were successful in attracting recent high school graduates and to give them an alternative to a college or university academic education. However, the vo-tech programs tended to follow the dictates of higher education and soon were based on the semester, the college calendar, and the summer vacation. Nonetheless significant expansion has occurred in South Dakota because of training in vocational skills.

The new thrust in Federal Vocational Funding is to emphasize new technology and to create new programs better suited to the information age rather than agricultural or industrial. It is gratifying to see that the Education Department and the Labor Department are together, presenting the

need for skill training through the Joint Training Programs Act. It is the need for cooperation between industry, labor and education that can bring back our strong industrial base and help us compete with less costly foreign labor.

To this end of education, but particularly vocational training, needs a new approach. For too long vocational training was modeled on the academic college model. We need to transfer to the industry image of training to be competency-based, individualized, with open-entry, open-exit possibilities. Training should be when needed, not when convenient to offer. It should be individualized because no two people learn at exactly the same rate. It should be competency based so an employer knows, on an application, exactly what an employee can do and in which skills he is competent. The secondary vo-tech training should fit into the post-secondary just as secondary academic fits into post-secondary academic education. Again, the vocational training must be available throughout an employee's lifetime. Successful companies now provide their employees training while employed. This should also be carried on by our vocational training programs from high school, to post-secondary to continual re-training and/or upgrading.

Putting all of America back to work; the urban, the rural, the industrial, the agricultural and the minorities is the goal. Competition on a world market is now a fact. Training and education will make or break a nation. As a representative of a rural agricultural economy we will need the support, the interest and the cooperation of government and business to provide the opportunities in a changing agricultural society. I am not here to ask or beg for more federal monies. We just hope that we can take the available federal monies, add to the state and local monies and put these monies to work in a way that as our economy changes, we can change and adapt to what is referred to as the "Information Age!" Technology, special skills, basic education and the opportunity to use talents in the best way is the goal. To do this we need an organized program, incorporating business, manufacturing, labor and education.

While the question as to the rural economy needs a solution, so does the question of our overall Nation's economy. There are areas throughout the nation that have similar problems and need similar solutions.

SUGGESTIONS FOR CHANGE

Skill Training Programs

The Vocational Act of 1963 was implemented to provide skill training to the future employees of industry. The funding came to the educational institutions such as public school districts, special vocational school districts, college or universities or community college. None of these really understood the need of industry and labor for skilled training.

Therefore the vocational education monies were most often used to provide an alternative for students who did not like academics but wished to be in a school or college setting. This has existed and grown for the past twenty years. The Department of Labor has had to develop their own skill training programs because educator developed programs were not suited to train basic labor needs. CETA, JOBS, and ADC were some the Labor Department added. Again, we have education, industry and labor at odds over skill training.

Labor wants skill training for job placement!

Education wants skill training for technical education!
and often serves it up in a collegiate model.

Fortunately there is opportunity through Federal programs, such as the new Vocational Education Bills and the Labor Department's JTPA program, the ability to provide vocational training institutes with a training curriculum that meets the needs of both the graduating high school senior and the returning needs of the unskilled worker, the obsolete worker and the continuous retraining of any employee. The open-entry, open-exit, individualized and competency-based curriculum is now a possibility.

Again, we have to thank technology in the form of the computer. Interactive video, computer managed instruction, computer assisted instruction and computer based instruction, have made possible the teaching and training of skills to individual students according to their individual ability, previous knowledge and motivation.

In the past we placed people in classes of 15 to 20, worked with them as a group, lectured as a group and graduated as a group. While there were 15 to 20 individuals, each with varying abilities, we taught all 15 to 20 at the same pace and with the same material. The computer can free an instructor from this artificial environment. It makes possible individualized training.

SUMMARY

As an educator, interested and involved in both academic and skill training for the past 37 years, I feel education is in for its greatest change since the beginning of history.

We are entering a period of time where, due to technological advancements, creative thinking, industrial competition between nations, the motivation of a declining economy, and change in education, procedures will be placed, forced, and dictated to educators.

The concept of individualized educational programs for each learner is within reality. Skill training for specific employment objectives will be the first area to be developed and is essential. Our Nation must again be competitive. Our midwest agricultural area must be able to quickly adjust to diversification as must other areas of the Nation.

A unified plan from this Congress utilizing monies being appropriated for bits and pieces, through labor, education, welfare, health and associated agencies, needs to be developed.

The development of a consensus on the need for skill training for every member of our society is needed. Our business and industry must have better skilled employees to compete with foreign labor.

As the economy of an area of our Nation changes as it has in the agricultural section, there must be a method to retrain and upgrade the work force to new and needed skills.

Senator ABDNOR. Thank you, Mr. Cockle. I was intrigued by your statement that you feel education is in for its greatest change since the beginning of history. Do you think we are set for it in South Dakota?

Mr. COCKLE. We are, Jim. We have to throw away some of the traditions that we have had, though. I think every State has to. People do not like change.

Senator ABDNOR. It stayed with us for a long time. This change is now taking place?

Mr. COCKLE. That is right.

Senator ABDNOR. I will be interested when we get into that.

You have a unified plan. Quickly, is that more like the block grant we are talking about, instead of going into all those other areas?

Mr. COCKLE. Well, back in the 1950's, Congress put through a Manpower Development Training Act which combined education, labor, and welfare. At that time, education and welfare were together.

I think we need something like that again. We have to put all of our resources in one thing. For example, the Vocational Education Act, the money is all given to education. Well, education is not exactly the same as skill training, and the Labor Department needs to get further into the act. They have tried through the JTPA program but they need more help.

Senator ABDNOR. Good point.

We are going to jump into another field that has been alluded to this morning—health care. If I can speak again, we in South Dakota are the most rural or all rural.

Mr. Wright, you come to us from Georgia and you have been working in the area of American rural health. I am anxious to hear from you.

STATEMENT OF STEPHEN WRIGHT, DIRECTOR, OFFICE OF RURAL HEALTH, GEORGIA SOUTHERN COLLEGE

Mr. WRIGHT. Thank you, sir. We appreciate, Mr. Chairman, the opportunity to submit testimony before the Joint Economic Committee on the subject of rural health.

In this statement, you will hear some alarming statistics which characterize a very severe and critical situation in rural America. My hope is that this testimony will be meaningful to you as you address these health problems of rural America and look to solutions. In my view, rural needs are head and shoulders above those of urban areas and require special attention.

What I would like to do today is very briefly present evidence and build a case that rural Americans are at a health risk; that there are only partial explanations for the poor health of rural residents, and that adequate resources to provide care are not available. I will also make several brief general recommendations if this is appropriate.

Senator ABDNOR. Fine. Let me say, the whole material will be made a part of the record.

Mr. WRIGHT. Good, thank you. I am summarizing here.

Senator ABDNOR. Fine.

Mr. WRIGHT. Rural areas of this country have been described as health disaster areas, a description that seems totally foreign to the modern view of clean air and good living in the country.

It seems unreasonable that this would be the case. However, recent scientific studies reveal surprising evidence that substantiates the view that a true health disaster exists in rural areas of this country. There is much recent evidence from studies in States such as my own in Georgia that rural residents suffer from a heavy burden of chronic diseases.

A comparative study of 1979 rural mortality found that rural death rates are higher than urban death rates. In fact, the crude death rate was 29 percent higher; the stroke death rate was 56 percent higher; and motor vehicular accidental death 83 percent higher than the urban rates.

Senator ABDNOR. Is this for the Nation, or Georgia?

Mr. WRIGHT. This is Georgia, but there are some comparable national figures I will give you in just a second.

In Georgia, this actually worked out to 212 more deaths per 100,000 population than the urban areas. So, this large difference was certainly unexpected and could not have been predicted.

Nationally, there has been recognition that rural populations are also vulnerable to a higher incidence of modern and chronic diseases. Recent studies have reported higher infant mortality and maternal mortality rates in rural areas, and some have reported higher crude death rates, as we found in Georgia. Rough calculations of vital statistical data revealed a total crude death rate in nonmetropolitan America 13 percent higher than the metropolitan rate.

By cause of death, there were several areas that we looked at in these rough calculations. Stroke deaths were 31 percent higher; arteriosclerosis, 34 percent higher; motor vehicular accidents, again, 68 percent higher—this is national—than the metropolitan rates. The 85 years and older group had a rural death rate 33 percent higher than the corresponding urban rate.

This phenomenon of a higher rural death rate is a relatively recent one. During the first days of modern public health, cities were known as very unhealthy places to live, due primarily to the infectious disease problems that cities had. In the decade of the 1950's, the urban death rate was actually higher than the rural death rate. That the relationship between rural and urban death rates has changed is simply astounding to me.

Now, just a brief word about the demographics of rural America as it relates to health. As you know, the demography of an area and the level of health are very much related. Some factors that tend to have a negative effect on health are a high percentage of elderly, a high poverty rate, inadequate housing, and a high median age.

Well, as you know, rural America has all of these. However, there may be more at work than just demographics in creating this picture of poor health that we have of rural people, and this is part of the mystery.

Another health problem in rural America is the critical shortage of health care professionals. There are simply not enough doctors, nurses, and other health care professionals to go around. This rural

manpower shortage affects the rural population more than just by making health care inconvenient. I believe that it directly relates to the lowering of the level of the health of the population in rural areas—not necessarily in urban but certainly in rural areas.

Now briefly, the data show that metropolitan areas have more than twice the number of physicians to population than nonmetro areas. There are approximately 60 percent more dentists; 60 percent more registered nurses; 250 percent more podiatrists. Speech pathologists, respiratory therapists, physical therapists—the list goes on and on—are much less available in rural America.

In a recent study in my home State we found that of the 13 professions studied, only optometrists had a higher nonmetro rate. Perhaps in rural America we have better eyes, but I am a little worried about our other parts.

Let us seriously look at this snapshot that we have just described. We have a sicker rural population which is poor and older and has a higher mortality rate. And yet, has much fewer health care professionals to provide care for those people than in urban areas. This is the worst possible combination of variables and one about which we are very concerned.

The economic outlook in rural America depends on a number of factors, but perhaps the most important is the human or people resource. Without a healthy population capable of providing the brain power and the muscle power needed, any system would flounder. Certainly, this is true for rural America where there appears to be a number of health and disability problems. A healthy, vibrant population is needed if rural America is to ever reach its economic and production potential.

Now, I have several brief recommendations, and I will mention those and shorten the presentation.

One, at least in the short run, continue Federal rural health care delivery programs such as the National Health Service Corps Program and Rural Health Initiatives.

Two, continue and expand financial support for rural targeted health professional education programs as a primary strategy to get rural professionals into rural areas.

Three, expand support for research which investigates problems relating to the rural setting such as stroke and rural accidents. You may have heard yesterday that the National Academy of Sciences said that only 2 percent of the research money looks at accidents.

Two rural occupations, farming and mining, have the highest on-the-job death rates, 52 and 50 deaths per 100,000. Accidents, motor vehicular accidents—you have heard 68 percent nationally, 83 percent in Georgia more than urban death rates. It is a tremendous problem and needs attention.

Four, establish a focus for rural health within the Federal Government. Currently, many health problems fall between the cracks of our Federal bureaucracy; we have health and rural, but we do not have the two brought together.

Five, continue and expand the emphasis on primary care. What this country needs is fewer heart transplants and more prenatal care. In this day of limited resources we must begin to emphasize basic preventive care and get away from our fascination with high-

cost, low-impact procedures. For the cost of a typical heart transplant which has been estimated to be \$94,900 for the first year, almost 171 pregnant women in Georgia could receive Medicaid prenatal physician care and delivery services.

Let us look at it from another angle. If we only had \$94,000 to spend on either of these procedures, how would we spend it? I am convinced that there is more gain and worth in giving just one mother prenatal care and increasing the likelihood of a healthy baby than in a heart transplant. A sick or mentally deficient baby can cost society a great deal over its full life. Multiply this effect times 131 for a true comparison.

It is my belief that rural America needs basic primary care more than the high-cost, high-technology care. In so many areas, the population does not even have access to this basic care, and low-cost primary care can have a dramatic effect on the health of rural populations.

In summary, you have seen that rural America is truly a health disadvantaged population. There is a high mortality rate from a number of causes, including strokes, flu, pneumonia, accidents, and so on. The rural population is older and poorer, which aggravates the situation measurably. There are severe maldistribution problems in practically all health professions, resulting in massive accessibility barriers throughout rural America. A population with poor health and yet shortages in all types of health professions is the worst possible situation.

I believe that the effect of these health problems on the rural economy is significant.

I will be glad to respond to any questions.

[The prepared statement of Mr. Wright, together with attachments, follows:]

PREPARED STATEMENT OF J. STEPHEN WRIGHT

Mr. Chairman, thank you for this opportunity to submit testimony to the Joint Economic Committee on the subject of rural* health. In my testimony, you will hear alarming health statistics which characterize a very severe and critical situation in rural America. My hope is that this testimony will be meaningful to you as you address the health problems of rural Americans and seek solutions. In my view, the rural needs are head and shoulders above urban health problems and require your special attention.

It should be noted that the views expressed herein are my personal views and do not necessarily represent those of the American Rural Health Association. However, I believe that much of this testimony would be consistent with that collective perspective.

What I would like to do today is to present evidence and build the case that rural Americans are at a health risk; that there are some partial explanations for the poorer health of rural residents; and, that adequate resources to provide care are not available. I also will make several recommendations which relate to increasing rural health manpower and other concerns of rural America.

*In this testimony, the terms "rural" and "nonmetropolitan" are used interchangeably as well as the terms "urban" and "metropolitan." In most cases, the U.S. Census definitions of "nonmetropolitan" and "metropolitan" apply.

Rural areas of this country have been described as "health disaster areas"¹ --a description which seems totally foreign to the modern view of rural living. Is it not true that the clean air and good living in the country cause residents to be healthier and to live longer? It seems unreasonable that this would not be the case. While this may not be totally untrue, statistical evidence suggests that equating ruralness with good health is a myth. Recent scientific studies reveal surprising evidence that substantiates the view that a true "health disaster" exists in rural areas in this country.

High Rural Death Rates

There is much recent evidence from studies in such states as my own, Georgia, that rural residents suffer from a heavy burden of chronic diseases.¹⁻³ A comparative study of 1979 mortality in rural and urban areas of Georgia revealed much higher rural death rates.¹ The crude death rate in rural Georgia was 29% higher than in urban Georgia. In a comparison of actual death rates, there were 212 more rural deaths per 100,000 population than urban deaths. The large difference was certainly unexpected and could not have been predicted.

The investigators analyzed the mortality data by specific cause of death and again found a heavy burden of rural death.¹ Of the 13 most frequent causes, 9 categories had significantly more deaths in rural areas than expected. Only homicide was significantly higher in urban counties. By specific cause of death, the rural rate for stroke was 56% higher than the urban rate, for heart disease 39% higher, for urinary-related diseases 53%, for motor vehicle accidents 83% higher, and for respiratory-related diseases 26% higher than the urban rates. Most of these differences persisted when age-race adjustments were made.

Mortality was found to be inversely related to the size of the county population. The death rate actually increased significantly as the county population decreased revealing that the larger counties had the lowest death

rates and the smaller counties had the highest. Significantly higher rural death rates have been confirmed in a more recent study of rural and urban county death rates in Georgia.³

Nationally, there has been a recognition that rural populations are vulnerable to a high incidence of modern chronic diseases, because they are poorer, less educated, and older. Recent studies have reported higher infant and maternal mortality rates in rural areas,^{4,5} and some have reported higher crude (from all causes) death rates.⁶⁻⁸ Rough calculations of vital statistics data reveal that the total crude death rate in nonmetropolitan America is 13% higher than the metropolitan rate.⁹ By cause of death in rural areas, stroke deaths are 31% higher, arteriosclerosis deaths are 34% higher, and motor vehicle accident deaths are 68% higher than metropolitan rates. The rural elderly had death rates considerably higher than the urban. For example, the 85 years and older group had a rural death rate 38% higher than the corresponding urban rate.¹⁰

The phenomenon of a higher rural death rate is a relatively recent one. Urbanization had long been recognized as being associated with higher death rates while rural living was regarded by many as part of the "good life". This characterization of cities as unhealthy places probably came about in the first days of modern public health care practice when inhabitants of urban areas were particularly vulnerable to the great epidemic diseases which were then the leading causes of death.¹¹ Higher death rates in urban areas have also been demonstrated for coronary heart disease,¹²⁻¹⁴ deaths from all causes^{14,15} and particularly from cancer.¹⁶⁻²⁰

In Georgia, the higher rural death rate is also a dramatic departure from historical trends. In the middle of the 1950s, the urban death rate was actually

higher than the rural.²¹ For whites 45-64 years of age, the urban rate was 12% higher than the rural. Coronary heart disease contributed much to this situation with an urban death rate 30% higher than the rural. That the relationship between rural and urban mortality has completely reversed in only 20 years is astounding.

The People of Rural America

The demography of an area is very much related to the health of its residents. Some factors that tend to have a negative effect on health are a high percentage of elderly, a high poverty rate, inadequate housing, and a high median age.

Age

In 1982, rural America had relatively more elderly people than urban America.²² The non-metro areas had 11.4 percent of its residents 65 years and older compared to only 9.2 for urban America. The median age for metro America was 30.5 years versus 30.9 years for non-metro.

Income

Rural Americans are poorer economically than urban Americans. In 1982, the percentage of non-metro population in poverty was 17.8% versus 13.7% for metro.²² In the same year 18% of the non-metro elderly were below the poverty level as compared to 12.6% of the metro elderly.

Part of the higher non-metro mortality rate can then be attributed to the effect of the older and poorer population in non-metro America.

Shortages of Health Professionals

In rural America, there is a critical shortage of health care professionals. There are simply not enough doctors, nurses, and other health professionals to

go around. This rural manpower shortage affects the rural population more than just by making health care inconvenient. I believe that it directly relates to the lowering of the level of the rural population's health. With this in mind, let's look at the data on the distribution of health professionals.

The vast majority of the health manpower data analyzed for rural America deals with physicians. Metropolitan areas have more than twice the number of physicians-to-population than nonmetro areas.²³ In metropolitan counties, there are more than five times the rate of hospital-based physicians and almost twice the rate of office-based physicians than in non-metro counties.

Other health professions also demonstrate geographic maldistribution problems. There are approximately 60% more dentists and registered nurses in metro than nonmetro areas and 250% more podiatrists.²⁴

Allied health professionals are also available in much smaller numbers in the rural areas. Speech-language pathologists, respiratory therapists, physical therapists, dental hygienists, occupational therapists, and many others are much less available in rural America.²⁴ A recent study in my home state will be used to illustrate the wide gap between urban and rural.²⁵ Metro Georgia had more than four times the rate of psychologists, three and a half times the rate of occupational therapists, and more than twice the rate of opticians, physical therapists, and podiatrists than did nonmetro Georgia. Of the 13 professions studied, only optometrists had a higher nonmetro rate. Perhaps in rural America we have the better eyes, but all of our other parts seem to be in trouble.

Let's seriously look at the situation that we've just described. We have a sicker rural population which is poorer and older and has a higher mortality rate (to illustrate this, we can look again at the example of Georgia where on

an adjusted basis, 13 more people die daily in rural counties than in urban-- or a total of 4567 for the year). Obviously, with a population as sick as this one, a considerable amount of health care is needed. It follows then that there is a much greater need for health professionals in rural America than in urban. Yet, in reality, it appears that the reverse is true because urban America has the whale's share of the health professionals. The rural health manpower shortage compounds an already bad situation.

Impact on Rural America

The economic outlook in rural America depends on a number of factors but perhaps the most important is the human or people resource. Without a healthy population capable of providing the brain power and muscle power needed, any system would flounder. Certainly this is true in rural America where there appears to be a number of health and disability problems. A healthy, vibrant population is needed if rural America is to ever reach its economic and production potential.

Recommendations

What steps are needed in terms of health to move rural America closer to its full potential? The following recommendations are made as suggestions to deal with our rural health problems.

- i. At least in the short-run, continue federal rural health care delivery programs.

Certainly, I would recommend continuing the National Health Service Corps and the federal health care programs such as the Rural Health Initiative. Although, I look at these as being short-term solutions in most cases, there is still a great need in many rural areas which would otherwise go unmet.

2. Continue and expand financial support for rural-targeted health professional education programs.

We will always have geographic areas where federal health care is needed but I'm convinced that in most situations there's a better way and I believe a cheaper way in the long-run. And that is to target health manpower educational programs to the rural setting. The strategy is to develop these programs so that their graduates will be more likely to choose a rural practice setting and more likely to stay there.

I believe that the most effective way to deal with the problem of rural manpower shortages is to develop more of these rural-oriented educational programs. Unfortunately, the vast majority of our existing institutions are urban-oriented. Because most health professions education programs are located in populated areas, the base of operation and practice has been predominately urban.²⁶ The students live, learn and work in an urban environment. The educational program is based on the metropolitan model of high volume care with very sophisticated support facilities, personnel and equipment. Consultation is readily available from a number of specialists and from colleagues in a number of fields. The most recent literature and means to access it are generally available. Faculty in such programs instill in the students, perhaps not always by design, a sense that the urban medical setting is the "very best" and the mark for which they should strive. The concept of quality of care begins to become enmeshed within the fabric of the urban institution. The student learns to equate quality of care with degree of urbanization of the particular health care situation.

High quality care can certainly be available in the urban tertiary centers but it may just as well be found in the small rural hospital or other rural

setting. The ruralness of the setting in itself has no direct effect on the quality of care.²⁷ In fact, were it not for the manpower shortages and the lack of available professional continuing education, perhaps the best care would be available in the rural setting. Unfortunately, the main stream of our health professional schools have a tradition which perhaps subliminally, encourages its students to reject the rural and places the premium on the urban, tertiary center.

These rural-targeted programs should include the following four strategies:

A. Recruit rural-reared students--Many studies of choice of practice settings by physicians and other health professionals have indicated that individuals reared in rural areas favor the rural practice site. For example, Heald et al.²⁸ found that rural-reared physicians are three times more likely to practice in a rural area than are urban-reared physicians. Philips et al.²⁹ found that 85% of the allied health graduates in the south Texas region returned to work in the area of previous residence. It has been demonstrated repeatedly that health professionals who grew up in small towns are more likely to practice in small towns.³⁰⁻³⁴

B. Train students in the rural setting--The location of the educational program appears to be a major factor in the student's selection of a practice site. For example, research on physician location³¹ suggests that the location of residency training is associated with practice site selection (even more so than medical school location). Similarly, studies show that students who graduate from urban-based programs tend to remain in the metropolitan area.²⁶ In fact, graduates from any program tend to live and work reasonably close to their educational program.³⁵ Because most health professions education programs are located in urban settings, graduates have tended to stay in these urban locations.

C. Include instruction on the rural setting and rural practice--For programs targeted to rural areas, preparing the student for the rural experience should be a major objective of the curriculum.

D. Assist graduates in finding rural practices--The educational program staff can play a very positive role by helping match-up the class of graduates with the available jobs.

3. Expand support for research which investigates problems related to the rural setting.

A much stronger research effort is recommended for several key areas:

A. Cerebrovascular disease--Strokes kill rural residents at a rate 31% higher than the metro rate (in Georgia 56% higher). Learning more about why this disease afflicts rural people to such a degree and the associated environmental factors are very important for this population.

B. Pattern of rural mortality--Rural Americans have a serious problem with high mortality rates. What is the mechanism, why are certain groups affected, and why do rural patterns of mortality in this country tend to be different than urban. Answers to these questions will help us understand the factors involved in the disease process, leading perhaps to preventive measures and ultimately to a much healthier rural population.

C. Rural health systems research--Studies of the unique problems of providing health care in the rural environment could provide valuable information which would be meaningful in terms of quality, accessibility, availability, cost, acceptability, and continuity and mix of rural health care.

D. Rural accidents and disability--Two rural occupations, farming and mining, have the highest on-the-job death rates (52 and 50 per 100,000 population) of all occupations.³⁶ Yet, rural accidental deaths and disability are major

problems which receive little recognition and even less serious attention. We can't afford anymore to take lightly the occupational hazards of rural work.

4. Establish a focus for rural health within the federal government.

Currently, many rural health problems fall between the cracks of the federal government. The Department of Health and Human Services is concerned about "health", the USDA deals with the "rural", but there is no agency or division of the federal government which has rural health as its priority. As a result, rural health problems have continued to grow with no national rural health strategy to deal with them. There is certainly a tremendous need for a rural health unit in the government.

5. Continue and expand the emphasis on primary care.

What this country needs is fewer heart transplants and more prenatal care. In this day of limited resources, we must begin to emphasize basic primary/preventive care and get away from our fascination with high cost, low impact procedures. For the cost of a typical heart transplant (first year costs--\$94,000)³⁷, almost 171 pregnant women in Georgia could receive Medicaid prenatal physician care and delivery services. Let's look at it another way--if we only had \$94,000 to spend on either of these procedures, how would we spend it. I'm convinced that there is more gain and worth in giving just one mother prenatal care and increasing the likelihood of a healthy baby, than in the heart transplant. A sick or mentally deficient baby can cost society a great deal during its lifetime. Multiply this effect times 171 for a true comparison.

It is my belief that rural America needs basic primary care more than the high cost, high technology care. In so many rural areas, the population does not even have access to that basic care. If several physicians or nurse

practitioners were added to a rural manpower shortage area, a dramatic upturn in the health status of the population would likely occur. This is unlike the effect of adding health professionals to a metro area where there would probably be no change in the population's health status. So, low cost primary care can have a dramatic effect in the rural setting.

Summary

In summary, rural America has a "health disadvantaged" population. There is a high mortality rate from a number of causes including strokes, arteriosclerosis, flu and pneumonia, and accidents. The rural population is older and poorer, which aggravates the situation measurably. There are severe maldistribution problems in practically all health professions, resulting in massive accessibility barriers throughout rural America. A population with poor health and yet shortages in all types of health professions is the worst possible situation.

The effect of these rural health problems on the rural economy is significant. The recommendations which are made are designed to focus attention to the problems, increase rural health manpower, expand rural health research, and encourage an emphasis on primary care, which is in short supply and yet most needed in rural America.

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A Comparative Analysis of Rural and Urban Mortality in Georgia, 1979

J. Stephen Wright, Ph.D.,*

Francois Champagne, Ph.D.,†

G. E. Alan Dever, Ph.D.,‡ and Frank C. Clark, Ph.D.*

This paper examines the relationship between mortality and ruralness in the state of Georgia. In 1979, the rural Standardized Mortality Ratio (SMR) for deaths from all causes was significantly higher than expected when compared to statewide levels, while the urban SMR was significantly lower ($p < 0.01$). Of the 13 leading causes of death, 9 had rural SMRs significantly higher than expected, while only homicide had a significantly greater urban SMR ($p < 0.01$). Although much of the rural/urban difference in overall mortality is attributed to the fact that the rural population is older, figures adjusted for age and race still reveal that the rural death rate is significantly higher than the urban rate ($p < 0.01$). Furthermore, there are several specific differences when analyzed by cause of death, age, and race that remain unexplained. Specific rural health problems include congenital anomalies, motor vehicle and other accidents, heart disease, and cerebrovascular disease. Specific urban health problems include homicides and cancer.

In addition to metropolitan status, a second indicator of ruralness, county population size, was used to analyze the data and produced similar results. As county population size increases, the total mortality decreases. [Am J Prev Med 1985;1(1):22-29]

Urbanization has long been recognized as being associated with higher death rates while rural living has been regarded by many as part of the "good life." This characterization of cities as unhealthy places¹ probably came about in the first days of modern public health practice when inhabitants of urban areas were particularly vulnerable to the great epidemic diseases which were then the leading causes of death. Higher death rates in urban areas have also been demonstrated for coronary heart disease,²⁻⁴ deaths from all causes,^{4,5} and particularly for cancer.⁶⁻¹²

Recently however, census data have been used by government agencies¹³ and other organizations as evidence that most rural populations are vulnerable to a high incidence of modern chronic diseases, because they are poorer, less educated, and older. Recent studies have reported higher infant

and maternal mortality rates in rural areas,^{14,15} and some have reported higher crude (from all causes) death rates.¹⁶⁻¹⁸ Although these studies indicated some disturbing trends, cause of death and age were not considered and, with the exception of one study,¹⁵ no statistical testing was done.

Although much has been done to analyze health-related data and to assess the health needs of Georgia residents, little information is available on the nature and magnitude of rural health problems in the state. In the 1950s, a study of middle-aged, white Georgians¹⁹ revealed a higher death rate in metropolitan areas. The death rate due to all causes for metropolitan whites aged 45-64 years was 12.0 percent higher than the nonmetropolitan rate, while for coronary heart disease, the metropolitan rate was 29.9 percent higher. A later study of cardiovascular mortality revealed a similar pattern, although the differences between metropolitan and nonmetropolitan rates had diminished.²⁰

The importance of determining the health status of rural as opposed to urban populations relates to the allocation of health resources and the need and demand for those resources. There may be factors affecting health status which stem from the ruralness or metropolitan character of a geographic

From the *Office of Rural Health and the Department of Mathematics and Computer Science, Georgia Southern College, Statesboro, Georgia, the †Department of Health Administration, Faculty of Medicine, University of Montreal, Quebec, Canada, and the ‡Department of Family and Community Medicine, Mercer University School of Medicine, Macon, Georgia. Address reprint requests to Dr. J. Stephen Wright, Director, Office of Rural Health, Georgia Southern College, Statesboro, GA 30460-8148.

area. The purpose of our study was to determine the relationship between mortality and ruralness in Georgia.

METHODS

Indicators of Ruralness

Two indicators of ruralness were used in this study. Counties of residence at time of death were first defined as either urban or rural. Counties designated by the U.S. Bureau of the Census as Standard Metropolitan Statistical Areas (SMSA) were defined as urban and the remaining non-Standard Metropolitan Statistical Area (non-SMSA) counties were defined as rural. The SMSA classification by the Bureau of the Census is based on the size of the population and the "metropolitan character of outlying counties."^{21,22}

The second indicator used was the size of the county population. The 159 counties of Georgia were assigned to eight groups according to their total population. The first group contained counties with populations of 0-9,999, the second group counties of 10,000-19,999, and so on to the final group of 70,000 and greater.

Source of Data

Mortality was selected as the health status indicator to be studied primarily because the data are comprehensive, comparable, and readily available. Mortality data were obtained from the Georgia Department of Human Resources for the calendar year of 1979. The civilian, noninstitutional population data used were 1979 estimates obtained from the Georgia Office of Planning and Budget. This office is the official source of population statistics recognized by the Georgia State Health Planning Agency. The classification of counties as SMSA or non-SMSA was obtained from the U.S. Bureau of the Census.

Statistical Methods

Rural and urban mortality rates were analyzed to determine the relative differences in rates and the magnitude of those differences. Thirteen of the leading causes of death in Georgia and deaths from all causes were studied. In order to account for age, the following four age groups were established: 0-14 years, 15-44 years, 45-64 years, and 65 years and over. In addition, infant mortality was studied. Race of the subjects was considered by establishing two subgroups, white and black. The black race designation was used for all non-

white residents since nonblack minorities composed only a small part of the total population (less than 1 percent). In order to maintain statistical relevance, any age, race, rural, or urban cell with less than 30 deaths was eliminated.

Rural and urban age-specific, race-specific, and age-race specific death rates from all causes were compared and the significance of differences was tested using the ratio (R) for two independent rates.^{23,24} Age-race adjusted death rates for all causes were calculated using the direct method of adjustment and the pooled population (that is the state of Georgia population) as the standard population.

Standardized mortality ratios (SMRs)—the number of observed deaths divided by the number of expected deaths and multiplied by 100—again with the state of Georgia as the standard, were also used for statistical comparisons of deaths from all causes as well as from the 13 leading causes of death in Georgia. The significance of the SMRs was computed using an approximation of the standard error^{23,24} and assuming a Poisson distribution.²⁵ Age-race specific SMRs for deaths from the 13 leading causes were also calculated.

Finally, the relationship between county population size and mortality was examined using SMRs, which were computed for the 13 leading causes of death and for total deaths for each of the eight groups of counties. The significance of the SMR of each group of counties was then determined.

RESULTS

Rural versus Urban Counties

A total of 42,758 resident deaths were reported in Georgia in 1979 from all causes. The distribution of deaths and population by rural (non-SMSA) and urban (SMSA) area, age, and race, as well as the ratios of rural over urban rates and the significance level of the difference between rates are presented in Table 1.

The state's crude death rate was 830.1/100,000 population. The rate for urban counties was 740.0/100,000 population and for rural counties 952.3/100,000 population, or 28.7 percent greater than the urban rate. This difference is statistically significant ($p < 0.01$). Although these crude death rates have limited meaning, they do have value in illustrating the relative size of the burden of illness and death in the rural counties.

The rural mortality rate is significantly higher ($p < 0.01$) than the urban mortality rate for both whites and blacks, although the difference is much

Table 1. Urban and rural mortality by age and race in Georgia, 1979

| Age group | Race | State | | | Urban | | | Rural | | | Rural/urban difference | | |
|---------------------------------|-------|------------------|------------|------------------------|------------------|------------|------------------------|------------------|------------|------------------------|------------------------|--------------------------|--|
| | | Number of deaths | Population | Death rate per 100,000 | Number of deaths | Population | Death rate per 100,000 | Number of deaths | Population | Death rate per 100,000 | R ^a | Statistical significance | |
| 0-14 | White | 930 | 897,836 | 103.6 | 469 | 529,699 | 88.5 | 461 | 367,937 | 125.3 | 1.42 | p < 0.01 | |
| | Black | 881 | 425,509 | 207.0 | 466 | 230,112 | 203.4 | 413 | 195,397 | 211.4 | 1.04 | NSD | |
| | All | 1,811 | 1,323,145 | 136.9 | 937 | 759,811 | 123.3 | 874 | 563,334 | 155.1 | 1.26 | p < 0.01 | |
| 15-44 | White | 2,833 | 1,743,812 | 162.5 | 1,551 | 1,058,573 | 146.5 | 1,282 | 685,239 | 187.1 | 1.28 | p < 0.01 | |
| | Black | 1,810 | 651,372 | 277.9 | 1,058 | 374,544 | 282.5 | 752 | 276,828 | 271.5 | 0.96 | NSD | |
| | All | 4,643 | 2,395,184 | 193.8 | 2,609 | 1,433,117 | 182.5 | 2,034 | 962,067 | 211.4 | 1.16 | p < 0.01 | |
| 45-64 | White | 7,525 | 733,434 | 1,024.6 | 3,990 | 421,192 | 947.3 | 3,535 | 314,243 | 1,124.9 | 1.19 | p < 0.01 | |
| | Black | 3,509 | 199,633 | 1,757.7 | 1,994 | 110,231 | 1,808.9 | 1,515 | 89,402 | 1,694.6 | 0.94 | NSD | |
| | All | 11,034 | 933,068 | 1,180.0 | 5,984 | 531,423 | 1,126.0 | 5,050 | 403,645 | 1,251.1 | 1.11 | p < 0.01 | |
| 65 and over | White | 19,135 | 368,908 | 5,186.9 | 9,240 | 176,810 | 5,225.9 | 9,895 | 192,098 | 5,151.0 | 0.98 | NSD | |
| | Black | 6,135 | 126,707 | 4,796.6 | 3,170 | 63,678 | 4,978.2 | 2,965 | 55,029 | 4,539.5 | 0.92 | p < 0.01 | |
| | All | 25,270 | 497,615 | 5,078.2 | 12,410 | 240,488 | 5,160.3 | 12,860 | 257,127 | 5,001.4 | 0.97 | p < 0.01 | |
| All ages | White | 30,423 | 3,743,791 | 812.2 | 15,520 | 2,186,274 | 697.5 | 15,173 | 1,559,517 | 972.9 | 1.39 | p < 0.01 | |
| | Black | 12,335 | 1,403,221 | 877.8 | 6,690 | 778,565 | 859.3 | 5,645 | 626,656 | 900.8 | 1.05 | p < 0.01 | |
| | All | 42,758 | 5,151,012 | 830.1 | 21,940 | 2,964,839 | 740.0 | 20,818 | 2,186,173 | 952.3 | 1.29 | p < 0.01 | |
| R = Rural rate minus urban rate | | | | | | | | | | | | | |

^a R = Rural rate/urban rate

NSD—No significant difference

greater for whites (39 percent versus 5 percent). Mortality rates are significantly higher in rural areas for all age groups, except the oldest age group (65 and over), for which the rate is significantly higher in urban areas. There seems to be an almost linear pattern between the extent of the difference between urban and rural areas and age, the differences gradually diminishing with age (from 26 percent to 16 percent to 11 percent higher to 3 percent lower in rural areas than in urban areas). When considering specific age-race groups, all white age groups with the exception of the group 65 years and over had significantly higher rates in rural counties than in urban counties. The rates for the 65 and over group are 2 percent lower in rural areas, but that difference is not significant. In the black groups, the only significant difference was found in the older group for whom the urban death rate is significantly higher than the rural rate. The linear age pattern is, however, present in both race groups.

As for SMRs, the rural mortality was significantly above what could be expected, and the urban mortality was significantly below (both $p < 0.01$). When the population is categorized into age groups, the rural groups, aged 0-14 years, 15-44 years, and 45-64 years, had mortality significantly above ($p < 0.01$) the expected while the converse was found in the urban counties (Table 2). In the over 65 groups, no significant differences were detected for either the rural or urban group.

This pattern also applies when whites only are considered. In the black groups, however, the only significant differences were in the group 65 years

and over for whom the urban SMR was significantly above the expected while the rural SMR was below (both $p < 0.01$). Table 2 summarizes the above results.

In order to better understand these results and to reveal more about the rural versus urban statistics, evaluations were made of mortality by the specific causes of death. The 13 most frequent causes of death were selected for analysis; they accounted for 39,996 deaths, or 94 percent of the 42,758 deaths in the state. Rural and urban SMRs are presented in Table 3.

Nine of the top 13 causes were responsible for significantly more deaths in rural counties than expected and significantly fewer in urban counties. Homicide was the only cause of death listed in which the SMR was significantly higher in urban counties and lower in rural counties than expected. There were no significant differences between observed and expected SMRs for three causes (digestive-related, congenital, and suicide). The causes of death with the greatest differences between rural and urban mortality rates (all higher in rural counties) were motor vehicle accidents (83 percent), cerebrovascular disease (56 percent), and urinary-related (53 percent).

The top 13 causes of death were also studied in relation to age and race. SMRs were calculated for rural and urban Georgia by cause of death, by race, and by age group. Table 4 presents the age-race specific groups with significant differences. Heart disease is higher than expected in rural counties for whites aged 45-64 years and lower than expected in urban counties for whites over age 44.

Table 2. Summary of findings on mortality from all causes

| Age group | Race | Significance of SMR | | Significantly higher rate |
|-------------|-------|---------------------|-------|---------------------------|
| | | Urban | Rural | |
| 0-14 | White | Below | Above | Rural |
| | Black | NSD | NSD | NSD |
| | All | Below | Above | Rural |
| 15-44 | White | Below | Above | Rural |
| | Black | NSD | NSD | NSD |
| | All | Below | Above | Rural |
| 45-64 | White | Below | Above | Rural |
| | Black | NSD | NSD | NSD |
| | All | Below | Above | Rural |
| 65 and over | White | NSD | NSD | NSD |
| | Black | Above | Below | Urban |
| | All | NSD | NSD | Urban |
| All | White | Below | Above | Rural |
| | Black | NSD | NSD | Rural |
| | All | Below | Above | Rural |

NSD—No significant difference

SMR—Standardized mortality ratio

Cerebrovascular disease is higher than expected in rural counties and lower than expected in urban counties for whites 45-64 and blacks over 64. Motor vehicle accidents are higher than expected in rural counties and lower in urban counties for whites of all ages and blacks 15-44. Other accidents follow the same pattern for whites 15-44. Deaths related to congenital anomalies are higher than expected in rural counties for whites 15-44. Cancer deaths are higher than expected in urban counties and lower than expected in rural counties for both whites and blacks over 64. Homicide for blacks 15-44 follows the same pattern, while digestive-related deaths in the same group are lower than expected in rural counties. Table 5 sum-

marizes these findings by showing the age-race specific significant problems.

The infant mortality rate for rural counties is not significantly different than the rate for urban counties. The SMRs for total infant deaths and for blacks and whites revealed that neither rural nor urban mortality was significantly different from the expected values

Size of County Population

Standardized mortality ratios which were calculated for deaths due to all causes for the eight population-based groups of counties are presented in Table 6 and illustrated in Figure 1.

Table 3. Standardized mortality ratios for the 13 leading causes of death in Georgia, 1979

| Cause of death | International code | Number of deaths | SMR | | Ratio of SMRs ^c |
|-------------------------|---------------------------|------------------|---------------------|---------------------|----------------------------|
| | | | Urban | Rural | |
| Heart disease | 390-398; 401-405, 410-429 | 15,676 | 85.70 ^a | 119.39 ^a | 1.39 |
| Cancer | 140-165, 170-175, 179-208 | 7,868 | 93.68 ^a | 108.50 ^a | 1.16 |
| Cerebrovascular disease | 430-438 | 4,600 | 80.78 ^a | 126.06 ^a | 1.56 |
| Respiratory-related | 460-519 | 2,610 | 89.98 ^a | 113.56 ^a | 1.26 |
| Motor vehicle accidents | 810-825 | 1,830 | 74.05 ^a | 135.18 ^a | 1.83 |
| Digestive-related | 530-579 | 1,638 | 97.35 | 103.56 | 1.06 (NSD) |
| Other accidents | 800-807; 826-949 | 1,246 | 92.44 ^b | 110.87 ^a | 1.20 |
| Other circulatory | 440-459 | 990 | 90.36 ^a | 113.04 ^a | 1.25 |
| Endocrine-related | 240-259, 270-279 | 977 | 89.77 ^a | 113.57 ^a | 1.26 |
| Homicide | 960-969 | 844 | 113.99 ^a | 80.93 ^a | 0.71 |
| Unnary-related | 580-599 | 671 | 81.54 ^a | 125.00 ^a | 1.53 |
| Suicide | 950-959 | 659 | 99.41 | 100.85 | 1.01 (NSD) |
| Congenital anomalies | 740-759 | 387 | 93.40 | 109.03 | 1.17 (NSD) |
| TOTAL | | 39,996 | 89.14 ^a | 114.72 ^a | 1.29 |
| ALL | | 42,758 | | | |

^a $p < 0.01$ ^b $p < 0.05$ ^c Rural SMR/Urban SMR

NSD—No significant difference

Table 4. Age-race specific groups with standardized mortality ratios significantly different than expected

| Cause of death | Race | Age group | Number of deaths | | SMR ^a | |
|-------------------------|-------|-----------|------------------|-------|---------------------|---------------------|
| | | | Urban | Rural | Urban | Rural |
| Heart disease | White | 45-64 | 1,477 | 1,317 | 92.30 ^b | 110.31 ^b |
| | White | 65 & over | 3,911 | 4,510 | 96.90 ^b | NSD |
| Cerebrovascular disease | White | 45-64 | 178 | 200 | 82.22 ^a | 123.82 ^a |
| | Black | 65 & over | 436 | 574 | 87.25 ^a | 112.48 ^a |
| Motor vehicle accident | White | 0-14 | 51 | 66 | 73.87 ^a | 137.62 ^a |
| | | 15-44 | 426 | 492 | 76.44 ^a | 136.39 ^a |
| | | 45-64 | 94 | 160 | 64.62 ^a | 147.42 ^a |
| | | 65 & over | 52 | 103 | 70.00 ^a | 127.61 ^a |
| | Black | 15-44 | 83 | 141 | 64.44 ^a | 148.11 ^a |
| Other accidents | White | 15-44 | 134 | 130 | 83.61 ^b | 125.31 ^b |
| Congenital anomalies | White | 15-44 | 21 | 33 | — ^c | 155.52 ^a |
| Digestive-related | Black | 15-44 | 88 | 40 | NSD | 73.00 ^a |
| Cancer | White | 65 & over | 1,702 | 1,637 | 106.17 ^a | 94.15 ^a |
| | Black | 65 & over | 582 | 443 | 113.02 ^a | 87.24 ^a |
| Homicide | Black | 15-44 | 253 | 116 | 119.23 ^a | 73.96 ^a |

^a $p < 0.01$ ^b $p < 0.05$ ^c SMR not calculated as there were only 21 deaths in this group.

NSD—No significant difference

SMR—Standardized mortality ratio

The SMRs of the four county groups with smaller populations were significantly above the expected, and the two larger population groupings were significantly below ($p < 0.01$). There were no significant differences found with the SMRs of the two more central county groupings (population 40,000-49,999 and 50,000-59,999). A linear configuration seems to illustrate the relationship between population size and mortality, indicating

that as the county population decreases, the death rate increases.

Analysis of SMRs by cause of death by county population grouping yielded much the same results. With few exceptions, county groups in the smaller population range had significantly higher SMRs and those in larger county groups had significantly lower SMRs. The SMRs for homicides tended to be the converse, as was the case when

Table 5. Significant problems (higher than expected mortality rate) by age-race specific groups

| Age group | Race | Rural | Urban |
|-----------|-------|---|----------|
| 0-14 | White | Motor vehicle accidents | |
| | Black | | |
| 15-44 | White | Motor vehicle accidents, other accidents, congenital anomalies | Homicide |
| | Black | Motor vehicle accidents | |
| 45-64 | White | Heart disease, cerebrovascular disease, motor vehicle accidents | |
| | Black | | |
| 65 & over | White | Motor vehicle accidents | Cancer |
| | Black | Cerebrovascular disease | Cancer |
| All | | Heart disease, cancer, cerebrovascular disease, respiratory-related, motor vehicle accidents, other accidents, other circulatory, endocrine-related, urinary-related. | Homicide |

Table 6. Standardized mortality ratios for all causes of death by county population

| Population range | 0-999 | 10,000-19,999 | 20,000-29,999 | 30,000-39,999 | 40,000-49,999 | 50,000-59,999 | 60,000-69,999 | ≥70,000 |
|-----------------------------|---------|---------------|---------------|---------------|---------------|---------------|---------------|-----------|
| Number of counties | 55 | 50 | 16 | 15 | 4 | 3 | 3 | 13 |
| Total population | 368,499 | 722,137 | 385,871 | 505,279 | 182,424 | 161,603 | 206,437 | 2,618,742 |
| Number of deaths | 3,700 | 7,236 | 3,544 | 4,393 | 1,431 | 1,371 | 1,479 | 19,554 |
| SMR | 120.96 | 120.71 | 110.64 | 104.74 | 97.80 | 102.20 | 86.31 | 89.95 |
| SMR significant differences | Higher* | Higher* | Higher* | Higher* | NSD | NSD | Lower* | Lower* |

* $p < 0.01$

NSD = No significant difference

using the metropolitan status as the indicator of ruralness.

DISCUSSION

The high rural death rate for all causes, which is 28.7 percent higher than the urban rate, is definitely influenced by the age of the rural population. The rural population aged 65 years and over is 11.76 percent of the total rural population, as compared to 8.11 percent for the urban population. In actual numbers, this represents a difference of 16,639 more citizens 65 and over in the rural population. The distribution of race is more equal: 26.3 percent of blacks in the urban counties versus 28.6 percent in the rural counties. When the death rate from all causes is adjusted for race and age, the difference decreases to a very large extent, but the rate is still significantly higher ($p < 0.01$) in the rural counties than in the urban counties (846.1 versus 821.6/100,000). Furthermore, as already seen, there are many differences between

rural and urban areas within specific age-race groups.

A most interesting finding is the almost linear relationship between age and the extent of the difference between urban and rural mortality. Rural mortality is much higher than urban mortality in the younger age group, but the difference decreases with age. For whites aged 0-14 years, the rate for deaths due to all causes is higher in rural areas. These excess deaths are due primarily to motor vehicle accidents. The higher infant mortality rate in rural counties contributes to the excess deaths in the 0-14 age group although the rural/urban infant mortality rate difference is not significant.

The mortality rate is also higher in rural areas for whites aged 15-44 years, resulting once again from motor vehicle accidents, congenital anomalies, and other accidents. Motor vehicle accidents also cause excess deaths in the rural, black group of the same age. However, there are excess deaths from homicide among this same group (blacks aged 15-44 years) in urban counties.

Whites aged 45-64 years living in rural counties also have a higher overall death rate than their counterparts in the city. Motor vehicle accidents once again account for some of these additional deaths as do heart disease and cerebrovascular disease. This higher death rate from heart disease and cerebrovascular disease in the 45-64 age group contrasts with the findings of Cover,² Enterline et al.,⁴ Sauer et al.,¹⁹ and more recently Moriyama et al.¹ It is, however, consistent with a U.S. government analysis¹¹ which showed higher nonmetropolitan death rates from cardiovascular diseases in the Southeast.

Although the rate for deaths due to all causes for the older white population is not significantly different in urban and rural counties, motor vehicle accidents cause excess deaths in rural counties, while cancer accounts for some excess deaths in urban areas. In the black group aged 65 years

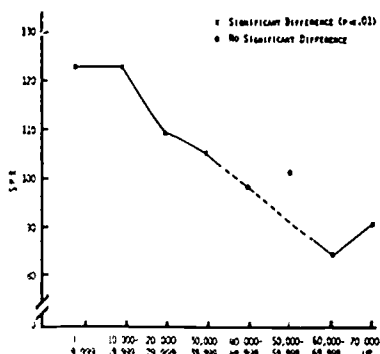


FIGURE 1. Standardized mortality ratios (all causes) by county size, Georgia, 1979

and over, the urban rate for deaths due to all causes is higher than the rural rate, the excess deaths resulting from cancer. There are, however, excess deaths from cerebrovascular disease in rural areas. This higher rate of cancer in both whites and blacks over age 64 in urban areas had been reported in several studies.⁸⁻¹² Perhaps the latent accumulative effect of cancer-causing chemicals generally concentrated in the metropolitan environment may explain this phenomenon.

It should be stressed that motor vehicle accidents caused excess deaths in rural counties for all white age groups as well as for blacks aged 15-44 years. The rural death rate for motor vehicle accidents for all age groups is 83 percent higher than the urban rate, which is the largest difference of the 13 causes of death. Possible factors contributing to the large difference could be more roadside obstacles and poorer roads in general in rural areas, and faster emergency medical service response and transport times in urban areas.

No significant differences were identified by age and race for respiratory-related, "other circulatory," endocrine-related, and urinary-related deaths. Yet, the total respective SMRs for each cause of death across all ages and races was found to be significantly higher in the rural and lower in the urban counties than expected. The lower number of observations in the age and race groups contributed to the inability of the testing procedure to reveal any differences in these groups.

Analyzing the relationship of size of county population to mortality provides another perspective on the relationships of geography and mortality (Figure 1). Mortality appears to be inversely related to county population size. As county populations increased to 40,000, mortality decreases to the point that the SMR is not significantly different than expected from the state average. However, at populations of 60,000 and above, the mortality rate decreases to the point that the SMR is significantly below the expected. Counties with populations under 40,000 had SMRs significantly above the expected value, which increased as the population decreased.

CONCLUSION

This investigation established a clear association between mortality and ruralness in Georgia. An increase in ruralness, measured by either of two indicators, was accompanied by an increase in the mortality rate. The rural death rate was found to be greater (almost 29 percent) than the urban rate. The difference persisted when age and race adjust-

ments were made and, in most cases, when analyzed by age and race subgroups.

The difference between rural and urban death rates was greatest in the youngest age group, decreasing in a somewhat linear pattern to the oldest group which actually had a higher urban death rate.

When analyzed by cause of death, 9 of the 13 most frequent causes of death had significantly higher rural mortality than expected. Analysis of age and race groups by cause of death tended to support these findings although there were several exceptions exhibiting higher urban mortality. Cardiovascular and cerebrovascular diseases, congenital anomalies, and accidents were prominent rural killers, while cancer and homicide favored selected metropolitan age and race groups.

In terms of crude death rates, rural Georgia has a much larger burden of death than the urban areas of the state. Yet an inappropriate share of public and private health resources continues to flow to urban Georgia where it is apparently needed less. The finding that for the most part rural residents have higher death rates than metropolitan residents has broad implications for health planners, educators and researchers, governmental officials, and others involved in making health policy and in allocating health resources.

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An updated look is taken at the mortality of rural/urban populations in the state, revealing some fascinating results.

Mortality in Rural Georgia

J. STEPHEN WRIGHT, Ph.D., *Statesboro*, and G. E. ALAN DEVER, Ph.D., M.T., *Macon**

IS COUNTRY LIVING really healthier than life in the big city? The typical Georgian will agree that living in a small town or the country is a positive health factor and adds years to one's life. However, previous research on the subject in Georgia shows mixed results. This question is probed in the research project presented here. An updated look is taken at the mortality of rural/urban populations in the state, revealing some fascinating results.

Background

The association between rural or urban residence and mortality is a subject of controversy. Until recently, urbanization was recognized as being associated with high mortality rates. Cities were characterized as notoriously unhealthy places,¹ probably as a result of the great epidemics of infectious diseases during the first days of modern public health practice. Higher death rates in urban areas have also been demonstrated for coronary heart disease,²⁻⁴ deaths from all causes,^{4, 5} and particularly for cancer.⁶⁻¹²

Recent studies, however, have reported higher infant and maternity mortality rates in rural areas,^{13, 14} and some have reported higher crude (from all causes) death rates in rural areas.¹⁵⁻¹⁷ Although these studies have indicated some disturbing trends associated with rural mortality, such factors as cause of death and age were not considered and little statistical testing was done.

In Georgia, much has been done to analyze health-related data and assess the health needs of state residents. For example, studies have been conducted by the state on the incidence of hypertension

in metropolitan Atlanta¹⁸ and disease patterns of black Georgians.¹⁹ However, with the exception of a limited-scope study of rural health initiative in Georgia,²⁰ little information is available on the nature and magnitude of rural health problems. Two studies of mortality in Georgia in the 1950s and the 1960s reported a higher metropolitan death rate from cardiovascular disease for middle-aged white males²¹ and the general population.²²

Methods

Definitions and Data Source

Two indicators of rurality were used in this study. Counties of residence at the time of death were first defined as either metropolitan or non-metropolitan. Those counties designated as Standard Metropolitan Statistical Areas (SMSA) were considered metropolitan (or urban) and the remaining non-Standard Metropolitan Statistical Areas (non-SMSA) counties were considered non-metropolitan (or rural) areas.

The population density of each county, expressed as number of individuals per square mile, was used as a second indicator of rurality. Population per square mile seems to be a reasonably sound indicator of population density except that an underlying assumption is made that the population is dispersed over all of the area of the county.¹¹ This can be misleading when dealing with very large counties with nearly all the population concentrated in one area. This, however, is not the case in Georgia.

Mortality data were obtained from the Georgia Department of Human Resources for the calendar year 1979. The Georgia Office of Planning and Budget provided the estimates for the 1979 civilian, non-institutional population. The classification of counties as SMSA or non-SMSA was obtained from the U.S. Bureau of the Census.²³

* Dr. Wright is Director, Office of Rural Health, Georgia Southern College. Dr. Dever is Director of Clinical Epidemiology and Biostatistics, Mercer University School of Medicine. Send reprint requests to Dr. Wright, Box #148, Georgia Southern College, Statesboro, GA 30460.

Statistical Methods

Mortality rates were analyzed to determine the relative differences between rural and urban rates and the magnitude of those differences. The crude death rates as well as the 13 leading causes of death in Georgia were studied. Race and age sub-groups were established: white and black; 0-14 years, 15-44 years, 45-64 years, and 65-up years. All non-white residents were classified as black, since non-black minorities composed only a small part of the total population (less than 1%). For statistical purposes, any age-race-cause group with less than 30 deaths was eliminated.

Rural and urban age-specific, race-specific, and age-race-specific death rates from all causes were compared, and the significance of differences was tested using the ratio (R) for two independent rates.^{24, 25} Age-race adjusted death rates from all causes were calculated using the direct method of adjustment and the pooled population (i.e., the state of Georgia population) as the standard population.

Standardized mortality ratios (SMRs), again with the state of Georgia as the standard, were also used for statistical comparisons of deaths from all causes as well as the 13 leading causes of death in Georgia. The SMR²⁵ was computed as follows:

$$\text{SMR} = \frac{\text{Observed Number of Deaths}}{\text{Expected Number of Deaths}} \times 100$$

An SMR value of 100 signifies that there is no difference between the observed and expected number of deaths. An SMR value of 125 indicates that the observed deaths are 25% above the expected. On the other hand, a value of 75 indicates that the observed deaths are 25% below the expected number. The significance of the SMRs was computed using an approximation of the standard error.²⁵

A correlation analysis of the county density versus total mortality rate was conducted to determine the strength of association between rurality and mortality.

Results

In 1979, there were a total of 42,758 resident deaths from all causes reported in Georgia. The distribution of deaths and population by rural (non-SMSA) and urban (SMSA) area, age, and race, as well as the rural and urban rates and the significant differences between rates are presented in Table 1.

Total Mortality From All Causes

The crude death rate for the state of Georgia was 830.1/100,000 population. The rate for urban counties was 740.0/100,000 population and for rural counties, 952.3/100,000 population, or 28.7% greater than the urban rate. This difference in rates is statistically significant as are the differences for both

TABLE 1 — Rural and Urban Mortality, by Age and Race, Georgia, 1979

| Age Group | Race | Rural (non-SMSA) Death rate per 100,000 (r ₁) | Urban (SMSA) Death rate per 100,000 (r ₂) | R = $\frac{r_1}{r_2}$ |
|-----------|-------|---|---|-----------------------|
| | | | | |
| 0-14 | White | 125.3 | 86.5 | 1.421 |
| | Black | 211.4 | 263.4 | 1.04 |
| | All | 155.1 | 123.3 | 1.261 |
| 15-44 | White | 187.1 | 146.5 | 1.281 |
| | Black | 271.6 | 281.5 | 0.96 |
| | All | 211.4 | 182.5 | 1.161 |
| 45-64 | White | 1124.9 | 947.3 | 1.191 |
| | Black | 1694.6 | 1088.9 | 0.94 |
| | All | 1251.1 | 1126.0 | 1.111 |
| 65 and up | White | 5151.0 | 5225.9 | 0.98 |
| | Black | 4559.5 | 4978.2 | 0.921 |
| | All | 5001.4 | 5168.3 | 0.971 |
| All ages | White | 972.9 | 697.5 | 1.391 |
| | Black | 968.2 | 859.3 | 1.051 |
| | All | 952.3 | 740.0 | 1.291 |

* $p < 0.05$

† $p < 0.01$

whites and blacks ($p < 0.01$). When the death rate from all causes is adjusted for race and age, the difference decreases to a very large extent, but the rate is still significantly higher ($p < 0.01$) in rural counties than in urban counties (846.1 versus 821.6 per 100,000).

The unadjusted difference is much greater for whites than blacks (39% versus 5% higher than the urban). Mortality rates are significantly higher in rural areas for all age groups, except the 65-up year group which has a significantly higher urban rate ($p < 0.01$).

An interesting pattern was observed in the magnitude of the differences between urban and rural areas among the different age groups. The largest rate difference was 26% higher in rural, found in the 0-14 year group. This difference diminished with age — 16% (15-44 years) and 11% (45-64 years) higher in rural, and 3% lower in rural areas than urban areas (65-up years). When specific age-race groups are considered, all rural white groups with the exception of 65-up years had significantly higher rates than urban groups. The rate for this 65-up year group is 2% lower in rural areas, but the difference is not significant. In the black groups, the only significant difference was found in the older group where the urban rate is significantly higher than the rural rate.

With SMRs, the rural mortality was found to be significantly above what could be expected, and the urban mortality significantly below (both $p < 0.01$). As seen in Table 2, when the population is broken down into age groups, the rural groups, 0-14 years, 15-44 years, and 45-64 years, had mortality significantly ($p < 0.01$) above the expected, while the converse was found in the urban counties. In the

TABLE 2 — Summary of Findings for Mortality from All Causes

| Age Group | Race | Significantly higher rate | Significance of SMR ^a Rural | Significance of SMR ^a Urban |
|-----------|-------|---------------------------|--|--|
| 0-14 | White | Rural | Above | Below |
| | Black | NSD† | NSD | NSD |
| 15-44 | White | Rural | Above | Below |
| | Black | NSD | NSD | NSD |
| 45-64 | White | Rural | Above | Below |
| | Black | NSD | NSD | NSD |
| 65 and up | White | Rural | Above | Below |
| | Black | NSD | NSD | NSD |
| All | White | Rural | Above | Below |
| | Black | NSD | NSD | NSD |
| All | White | Rural | Above | Below |
| | Black | NSD | NSD | NSD |

^a SMR — Standardized Mortality Ratio
[†] NSD — No Significant Difference

65-up year group, no significant differences were detected for either rural or urban.

When race is considered, all white age groups conform to the same pattern. However, in the black group, only the 65-up year group exhibited significant differences, with the urban SMR significantly above the expected and the rural SMR below ($p < 0.01$).

Death From Specific Causes

In order to better understand these results and to reveal more about rural/urban difference, evaluations were made of mortality by the specific causes of death. Thirteen of the leading killers were studied in greater detail, accounting for 39,996 deaths or 94% of the 42,758 deaths in the state. Rural and urban SMRs are presented in Table 3.

Rural areas made a very poor showing as 9 of the top 13 classes of diseases showed significantly more deaths in rural counties than expected. Nine diseases also showed significantly fewer deaths in urban counties. Homicide was the only cause of death listed in which the SMR was significantly higher in urban counties and lower in rural counties than expected. The greatest differences between rural and urban mortality were motor vehicles (83%), cerebrovascular disease (56%), and urinary-related (53%). No significant differences were found between observed and expected SMRs for three causes (digestive-related, congenital anomalies, and suicide).

The 13 top causes of death were also studied in relation to age and race. SMRs were calculated for rural and urban Georgia by cause, race, and age group. Fifteen age-race-cause specific groups were found to have significant differences as shown in Table 4. High mortality predominated in rural coun-

TABLE 3 — Standardized Mortality Ratios for the Thirteen Leading Causes of Death, Georgia, 1979

| Cause of Death (International Code) | Number of Deaths | Rural SMR | Metropolitan SMR | Ratio of SMRs | Difference |
|---|------------------|-----------|------------------|---------------|------------|
| Heart Disease (390-398; 401-405; 410-429) | 15,676 | 119.39† | 85.70† | 1.39 | 39% |
| Cancer (140-165; 170-175; 179-208) | 7,863 | 109.50† | 93.68† | 1.16 | 16% |
| Cerebrovascular Disease (430-438) | 4,600 | 126.60† | 80.78† | 1.56 | 56% |
| Respiratory-related (460-519) | 2,610 | 113.56† | 89.98† | 1.26 | 26% |
| Motor Vehicles (810-825) | 1,830 | 135.18† | 74.05† | 1.83 | 83% |
| Digestive-related (530-579) | 1,638 | 103.56 | 97.35 | 1.06 | NSD‡ |
| Other Accidents (800-807, 826-949) | 1,246 | 110.87† | 92.44* | 1.20 | 20% |
| Other Circulatory (440-459) | 990 | 113.04† | 92.36† | 1.25 | 25% |
| Endocrine-related (240-259; 270-279) | 977 | 113.57† | 89.97† | 1.26 | 26% |
| Homicide (960-969) | 844 | 80.93† | 113.93† | 0.71 | -29% |
| Urinary-related (580-599) | 671 | 125.00† | 81.54† | 1.53 | 53% |
| Suicide (950-959) | 659 | 100.85 | 99.41 | 1.01 | NSD |
| Congenital Anomalies (740-759) | 387 | 109.03 | 93.40 | 1.17 | NSD |
| Total for Above Causes | 39,996 | | | | |
| All Causes | 42,758 | 114.72† | 89.14† | 1.29 | 28.7% |

* $p < 0.05$

† $p < 0.01$

‡ NSD — No Significant Difference

TABLE 4 — Age-race-cause Specific Groups with Standardized Mortality Ratios Significantly Different than Expected, Georgia, 1979

| Cause of Death | Race | Age Group | Significant Differences | |
|--------------------------|-------|-----------|-------------------------|--------------|
| | | | Rural | Metropolitan |
| Heart Disease | White | 45-64 | Highest | Lowest |
| | White | 65-up | NSD | Lowest* |
| Cerebrovascular Disease | White | 45-64 | Highest | Lowest |
| | Black | 65-up | Highest | Lowest |
| Motor Vehicle | White | 0-14 | Highest* | Lowest |
| | | 15-44 | Highest | Lowest |
| | | 45-64 | Highest | Lowest |
| | | 65-up | Highest | Lowest |
| Other Accidents | Black | 15-44 | Highest | Lowest |
| | White | 15-44 | Highest | Lowest* |
| Congenital Anomalies | White | 15-44 | Highest* | (a) |
| | Black | 15-44 | Lowest | NSD |
| Digestive-related Cancer | White | 65-up | Lowest | Highest |
| | Black | 65-up | Lowest | Highest |
| Homicide | Black | 15-44 | Lowest | Highest |

(a) SMR not calculated because there were only 21 deaths in this group.

* $p < 0.05$

* $p < 0.01$

NSD — No Significant Difference

NOTE: Groups not presented above were not significantly different.

ties from heart disease, cerebrovascular disease, motor vehicle accidents, other accidents, and congenital anomalies. Significantly higher urban mortality (SMRs) was found only with three age-race-cause specific groups, two caused by cancer and one by homicide. These findings are summarized in Table 5 in the form of age-race specific significant problems.

Population Density

There was a significant negative correlation between the rate of death from all causes in counties and density of counties ($p < 0.01$). The correlation

coefficient of -0.334 indicates that there is a significant inverse relationship between the county crude death rate and population density. As the population per square mile decreased (i.e., an increase in ruralness), mortality increased significantly and vice versa.

Discussion

The higher rural crude death rate (28.7% higher than the urban rate) is influenced strongly by the older rural population. The 65-up year component of the rural population is 11.7% of the total population as compared to 8.11% of the urban population. In actual numbers, this represents a difference of 16,639 more citizens of 65-up years in the rural population. The distribution of race is more equal: 26.3% of blacks in the urban counties versus 28.6% in the rural counties. However, the rural death rate is still significantly higher than the urban rate even after age-race adjustment. Moreover, as already seen, there are many differences between rural and urban areas within specific age-race groups.

A reversal in the previously reported pattern of higher metropolitan/lower rural mortality is a significant finding of this study.

An almost linear relationship was found between age and the extent of the difference between urban and rural mortality. Rural mortality is much higher than urban mortality in the younger age group, but the difference decreases with age. For whites 0-14 years, the overall mortality rate is higher in rural areas. These excess deaths were found to be due

TABLE 5 — Significant Problems (Higher Than Expected Mortality Rate), By Age-race Specific Groups, Georgia, 1979

| Group | Rural (Non-SMSA) | Urban (SMSA) |
|----------------------|---|--------------|
| 0-14 years White | Motor vehicle accidents | |
| 0-14 years Black | | |
| 15-44 years White | Motor vehicle accidents, other accidents, congenital anomalies | |
| 15-44 years Black | Motor vehicle accidents | Homicide |
| 45-64 years White | Heart disease, cerebrovascular disease, motor vehicle accidents | |
| 45-64 years Black | | |
| 65-up years White | Motor vehicle accidents | Cancer |
| 65-up years Black | Cerebrovascular disease | Cancer |
| ALL | Heart disease, cancer, cerebrovascular disease, respiratory-related, motor vehicle accidents, other accidents, other circulatory, endocrine-related, urinary-related. | Homicide |

primarily to motor vehicle accidents. Other causes of death are suspected of contributing to the high rural mortality in the 0-14 year group. However, many of these age-race-cause specific groups, especially the younger group, were eliminated from analysis because the actual number of deaths was too few to be statistically tested. Differences might be detected for additional specific causes of death in a multi-year analysis with a larger number of observations. The authors are currently working on a multi-year study.

The strong influence of an older population in rural counties has been noted as a contributing factor to the high mortality.

Motor vehicle accidents also contribute to the higher mortality rate in rural areas for whites over 14 years and blacks 15-44. The rural mortality rate for this cause of death in all groups is 83% more than the urban rate, making it the largest difference of the 13 causes of death. Poor roads and more roadside obstacles in rural Georgia and faster EMS response and transport times in urban areas likely play a role in the large rate difference.

Cardiovascular disease contributes substantially to the excess deaths occurring in rural counties. Heart disease in whites 45-64 and cerebrovascular disease in whites of the same age and in blacks 65-up account for this difference. These results contrast with the findings in several studies^{2-4, 21} but are consistent with a report¹¹ which showed high non-metropolitan death rates from cardiovascular diseases in the Southeast.

Whites 15-44 years living in rural areas also have a higher overall death rate than their counterparts from the city. Congenital anomalies account for some of these additional deaths as do non-vehicular accidents.

While the findings of this investigation have shown the severity of rural mortality, not all of the age-race-cause specific groups followed this pattern. In the 65-up year group, the urban death rate is actually higher than the rural rate, the excess deaths resulting from cancer. The higher rate of cancer deaths in both whites and blacks over 64 in urban areas has been reported in several studies.⁶⁻¹² One possible explanation may be that cancer-causing chemicals which generally are concentrated in metropolitan areas may have a latent cumulative effect on the residents.

Death by homicide was also found to be higher in metropolitan areas than in rural for blacks 15-44. Public crime reports have indicated that more murders per capita occur in larger cities. These findings confirm that more victims are from urban areas than statistically expected.

The correlation analysis between crude death rate and density of counties provides another way to assess the relationship between rurality and death rate. The inverse correlation supports the findings that rural Georgia tends to have a higher mortality rate than urban Georgia.

Summary

Rural Georgia has a significantly higher crude death rate than urban Georgia (28.7% higher). The strong influence of an older population in rural counties has been noted as a contributing factor to the high mortality. However, when age and race adjustments were made and analyses done by age, race, and cause, in general the differences persisted.

Significant problems in rural areas for whites are motor vehicle accidents, heart disease, cerebrovascular disease, other accidents, and congenital anomalies, and for blacks, motor vehicle accidents and cerebrovascular disease. In metropolitan counties, cancer is a significant problem for the elderly of both races, while homicide is a significant problem for blacks.

A reversal in the previously reported pattern of higher metropolitan/lower rural mortality is a significant finding of this study. The wide gap between rural and urban mortality which has been revealed in this paper adds to the mounting body of evidence of a "health-disadvantaged" rural population in Georgia. High mortality coupled with physician and other health manpower shortages all contribute to a bleak health outlook for rural Georgia.

Acknowledgements

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Education for Rural Health Professionals

Rural Practice: How Do We Prepare Providers?

The last decade has witnessed a rapid escalation in the number of higher education programs in the health and human services with a professed "rural orientation." Denouncing the urban-bias of conventional training programs and citing the incongruity between traditional coursework and the realities of rural practice, professionals in many different disciplines have urged the creation of distinctively rural curricula to prepare service providers for rural practice.

Yet these efforts have in part been hampered by an inability to articulate clearly the distinctive features of a rural training program. What changes in curricula need to be made to make programs more responsive to the needs of rural service providers? What are the skills that underlie successful rural practice and, therefore, must be taught during training? How should preparation for rural practice differ from the preparation of professionals for service in other community contexts?

The Journal of Rural Health has invited five prominent professionals to respond to the question: How should training in your profession be modified to prepare practitioners for service in contemporary rural America? Each contributor represents a critical profession within the rural system of health and human services — psychologists, public health professionals, physicians, physician assistants and nurses — and has been asked to address the issue from their own particular disciplinary perspective. In future issues of *The Journal of Rural Health*, representatives of other professions will be invited to respond to this concern.

These short statements are not meant to provide the definitive answer to this complex and evolving dilemma; rather, they are intended to further the debate on these issues and spark further discussion of the problem. If you would like to join in this deliberation, please feel free to use either the "Letters to the Editor" section of the journal as a forum for your ideas or prepare and submit for review an article for the "Education for Rural Health Professionals" section of the journal. Your input and viewpoints are welcomed! — *The Editor*.

psychologists . . .

Peter A. Keller

In recent years there has been an increasing interest among mental health professionals in rural service delivery issues (e.g., Flax, Wagenfeld, Ivins, and Weiss, 1979; Keller and Murray, 1982) and in questions about how best to prepare individuals for work in rural settings (Dengerink and Cross, 1982). The past had represented a sort of benign neglect of rural needs on the part of all but a few mental health professionals. Several factors have contributed to the new awareness, including a rural task panel as a part of the recent President's Commission on Mental Health (1978), identification of unique rural needs by National Institute of Mental Health staff, and the establishment of a National Association for Rural Mental Health.

While there has been a developing rural mental health literature, including the identification of needs for some type of specialized training for work in rural settings, the literature on professional preparation for rural settings has grown slowly. A number of programs in the disciplines of psychology (e.g., Murray, 1984; Howe,

**Biographical sketches for each author have been placed at the end of the article.*

1982), psychiatry (e.g., Koford & Cutler, 1982), and social work (e.g., Dunbar, 1982) have had the goal of preparing students for positions in rural mental health programs. Nevertheless, there is more speculation and discussion of issues than firm consensus about how to train rural mental health staff. The major issues which remain problematic include the recruitment and selection of mental health professionals for rural work, the need for unique training curricula responsive to rural service strategies, and the difficulty of creating practica and internship placements in rural settings.

RECRUITMENT AND SELECTION

Before training individuals to work in any setting, it seems only logical to ask (a) who might be interested in a career in that setting, and (b) what personal and professional characteristics might predict success and satisfaction in the setting. Although some may be seeking the mythical, idyllic rural community, those more familiar with the realities of various rural life styles are aware of the importance of carefully assessing the advantages and disadvantages of this life. Not all professionals who think a nonmetropolitan environment attractive will necessarily find satisfaction in such a setting.

Hargrove (1982; in press) and others have written about the need for a proper "fit" between mental health clinicians and the rural community. He has emphasized the importance of considering the overlap of personal and professional roles often observed in small rural programs, the demands to function as a generalist responsive to a wide range of problems which confront rural clinicians, and the need of individuals and their families to successfully adapt to the isolation and different social expectations often observed in rural communities. To date, most of the literature on these topics is based on the personal experiences of those who practice in, or who study, rural service delivery settings, and there is a continuing need for relevant empirical evidence.

A useful example of the type of professional problems to which Hargrove refers can be seen in the mental health clinician who must relate to a client in treatment at the same time a social or business relationship exists in another setting. Such conflicting relationships are often inevitable in smaller communities but might be considered evidence of poor professional judgement by practitioners in metropolitan settings. These issues have clear implications for the selection and training of students suited for rural work.

Dengerink, Marks, Hammarlund, and Hammond (1981) are among the few to have compared characteristics of rural and urban clinicians. Their sample of 116 psychologists indicated differences between the personal and professional values of rural and urban staff. For example, in the selection of their current positions rural professionals were more likely to have placed emphasis on crime rate, recreational opportunities, climate, and accessibility of their practice to clients. By contrast, urban practitioners were more likely to have emphasized the importance of continuing education facilities, contact with colleagues, and social and cultural factors. These authors also found that rural staff more often received their training in rural settings. Interestingly, there were no significant differences between the urban and rural samples in professional functions and qualifications, or in where they or their spouses were reared.

At this point there is generally a lack of evidence on which to base predictions about future satisfaction with rural settings. However, it would seem logical for training programs to emphasize the unique rural aspects of their approach and to encourage students through the educational program to examine carefully their values and expectations in relation to the realities of rural life. For example, programs with a rural training goal often note the nonmetropolitan location of the training, opportunities to gain experience in rural practica, as well as specialized courses which address small community issues and professional concerns. Such strategies encourage a self screening process for students. There is clearly a need to

During the past decade, a growing interest in disease prevention and health

Michael C. Hosokawa

Interest in rural health care ebbs and flows with various political currents. The shortage of health care resources in rural America includes physicians, other health professionals, facilities and funding. During the previous two decades, various federal programs, foundations and professional groups have sought to improve rural health care.

During the past decade, a growing interest in disease prevention and health

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Interest in rural he

During the past decade, a growing interest in disease prevention and health

promotion has focused attention on local and state public health departments. In addition to the regulatory and protective programs carried on by health departments (e.g. sanitation, water and food quality, communicable disease control and public health nursing) there has been a substantial increase in public health disease prevention and health promotion programming.

Although funding and support for public health is still minimal, public health continues to be an attractive career opportunity. Metropolitan health departments and state agencies offer the most positions for public health trained individuals; however, local health departments serving rural populations are expanding programs and recruiting staff, particularly in disease prevention and health promotion. As a consequence, institutions which prepare public health professionals for rural service must be sensitive to alterations in their curriculum which may be necessary to prepare individuals for the rural practice setting. In the text which follows, three aspects of training which education for rural health practice may require are discussed: (1) Savvy, (2) Skills and (3) Stability.

An individual must have the *savvy* to succeed in a rural environment which requires a great deal more than professional competence. Termed "streetwise" in an urban setting, the intangible ability to gain acceptance and community membership is often more important than professional skills, since without savvy, professional efforts are made more difficult and sometimes impossible.

Although a curriculum providing the content and process *skills* needed for public health in a rural setting is generically similar to curricula for other settings, these skills must be taught and applied in a rural context. The ability to work with people, a knowledge of individual and group behavior, program planning and implementation, and administrative and political competencies are some of the important process skills taught for application in a rural community.

Specific public health skills such as public health nursing, sanitation or health education vary with each professional group. Rural health departments and community agencies seldom have the programmatic concentrations to hire many specialists. As an example, a highly skilled substance abuse educator may be less valuable to a rural health department than a generalist health educator capable of working in schools, the community, engaging in patient education and taking blood pressures in the clinic, and doing a weekly radio show. Thus, the generalist with multiple skills and interests and an aptitude for adapting basic skills to meet the needs of specific situations is better suited for rural service than the specialist with a narrow range of skills.

Stability is the potential for the public health professional to be assimilated into a community. Those who find shared recreation, social life, life style, and religious interests tend to remain in rural communities. Individuals who find rural life devoid of desired cultural or social opportunities, feel isolated from the mainstream or feel socially and professionally out of place, do not stay in their professional position for long and devote substantial attention to job seeking. Programs preparing public health professionals have a responsibility to their graduates to prepare them to live in a community as well as work in a community.

Interest in rural health has generated a number of research studies to determine the most effective strategies for increasing the numbers and competence of health professionals in rural areas. The focus of these studies have been the physician, but the information gained is applicable to public health training. A review of selected studies yields two strategies for training health professionals for rural areas which have been applied with success (Brearly, Simpson and Baker, 1982; Cooper, Heald, Samuels and Coleman, 1975; Steinwald and Steinwald, 1975).

Recruiting and selecting students from rural backgrounds has been demonstrated to be effective, since the students are likely to return to rural settings as professionals. The strategy for using biographical characteristics such as hometown in the selection of medical students as a means of increasing the number of rural primary care physicians has been called the "genetic strategy" by Samacki (1979):

The second approach to training health professionals for rural service em-

phasizes curricular design — offering courses providing the skills and experiences to stimulate interest in rural service. Sarnacki (1979) called this the "environmental approach."

Denslow and others (1984) studied one institution's success in training rural primary care physicians and identified a third variable important in career choices — the role model. A role model either prior to training or during training was an important influence on later professional decisions.

Applied to public health training, the genetic approach has demonstrated success in placing professionals in rural settings. A large percentage of students from rural backgrounds seek positions in similar environments after graduation.

Empirically, the assimilation of an individual into a community is enhanced by his/her rural background. It appears the savvy gained from having grown up in a rural community can facilitate professional and social acceptance in a similar setting; however, the cause and effect relationship cannot be defined with precision.

While the genetic strategy increases the number of professionals, this approach does not address the issues of professional competence or the quality of the educational experience — a point emphasized by Sarnacki (1979) when the genetic strategy is applied to medical education.

The focus for training public health professionals for service in rural areas must be on curricular design. Courses and course content, experiences and role models are the key elements to a rural health curriculum or a rural health track. In addition to public health knowledge and skills, aspects of rural life styles, including socio-cultural and political information, should be integrated into the teaching/learning experiences.

On a university campus, a review of departments, courses, faculty research, grant funded projects and faculty publications yielded a wealth of accessible resources for a curriculum in rural health. Public health training is eclectic and campus-wide resources can be used to enhance a curriculum. A review of the syllabi from courses in areas such as sociology, psychology, anthropology, business administration, economics, hospital administration, home economics, and child and family development may reveal some interesting offerings to be used as required or elective courses. Faculty from these courses may team teach a course, give short seminars or guest lectures. Faculty with specific interests in rural health through projects, publications and research are also excellent teaching resources.

Public health borrows theory from numerous disciplines such as the biological sciences, behavioral sciences, nursing and mathematics. The uniqueness of public health is in the application of knowledge to human health. In the classroom, the use of case studies has been an effective means of bridging the gap from theory to application. Case studies with a rural theme not only give meaning to theory but also provide valuable information about rural people and their lifestyles.

While the case study method is an artificial means of applying knowledge, field experience is the opportunity to actually practice public health skills under the guidance of a professional. Field placements in rural practices, supervised by the alumni, are very effective learning experiences, since alumni understand the curricular objectives and can frequently relate more closely with the faculty of that program. Other sources of excellent field placements include the American Medical Student Association rural projects where multidisciplinary teams of student health professionals participate in a project, the Catholic Health Corporation's network of rural hospitals, and federally funded projects in migrant health and health in underserved areas.

The effectiveness of teaching about rural public health is enhanced by practicing rural public health. Ongoing service projects in rural communities involving students and faculty help demonstrate public health concepts applied in a rural setting. These projects keep faculty active in their profession while they serve as role models for the students. On a contractual basis, these projects provide income and/or student stipends, and on a voluntary basis, they build goodwill.

The use of adjunct faculty appointments can enhance a public health curricu-

lum. These non-salaried appointments are made in recognition of exemplary service to the public health curriculum. Adjunct faculty can be asked to participate in team teaching courses, to guest lecture in seminars, to serve as field experience supervisors and to join regular faculty in a periodic review of the curriculum. Included among the adjunct faculty may be alumni currently in rural service and other outstanding rural health professionals with local, state, regional and federal agencies. These faculty serve to keep the learning experiences on the leading edge of national, state and local activities.

Training public health professionals for rural service is best accomplished through a curriculum designed to accomplish the following: (1) to provide students with the skills needed for optimal professional success; (2) to involve students in the rewards and challenges of working and living in a rural environment; and (3) to provide access to role models who generate enthusiasm about their rural professions.

physicians . . .

Thomas Allen Bruce

There is a tendency to discount the need for special efforts to educate physicians for practice in small towns and rural communities; this has become even more pervasive as the supply of new physicians has continued to increase. The tendency quite obviously is to count on a diffusion effect of recent graduates to solve the chronic undersupply of rural physicians. Evidence that such a "trickle-out" concept is a valid and realistic approach to planning quality medical care for rural areas seems quite thin, however. Even to this day there is a rural access problem for medical care in all those states which traditionally have had the highest physician-population ratios. Moreover, the increasing numbers of physicians who seem to be locating outside the metropolitan areas appear to be concentrating in the mid-size cities where group practice and excellent hospital support facilities are present, not in the neediest small towns.

Aside from simply a numbers issue, there is a qualitative aspect to rural medicine which has been too long ignored. The knowledge, skills, and attitudes that rural physicians need are not necessarily those which are most appropriate in metropolitan practice sites. For example, the relative professional isolation that occurs in a rural setting creates an enormous difference in the practical approach to consultation and referral. It seems self-evident, moreover, that the *organizational* characteristics of rural practice are different and that the approach to rural practice management may be rather specialized. Below are outlined some of the approaches which medical schools might undertake to educate their graduates more appropriately for rural practice. The issues are divided into two general clusters: those efforts which are most useful in *recruiting* physicians to rural areas, and those efforts which impact on the long-range *retention* of physicians in rural areas.

RECRUITMENT CONSIDERATIONS

1. Medical schools need to establish visible efforts in rural medical development. Students and members of the housestaff should be reminded periodically that rural care has special needs and special priorities. It has been demonstrated repeatedly that doctors who grew up in small towns are more likely to practice in small towns, so it is possible to set up selective weighting of rural background characteristics in making *admissions* decisions for medical school. This might be particularly appropriate in those geographic areas where the rural problem is the greatest.
2. Medical centers should try to develop special scholarships and loan forgiveness programs for individuals interested in rural practice. These can be combined with other curricular and practice incentive programs, and should be powerful and effective tools in rural development. All such loan programs should have stiff penalties for non-compliance.

3. Faculty members should make extra efforts to see that premature closure on specialty careers does not invade the predoctoral years of education. The need for broad, general learning in medicine has never been so keenly appreciated in the past as it is at present, and the conclusions of the 1984 General Professional Education of the Physician (GPEP) report by the Association of American Medical Colleges has reinforced this concept (Physicians for the Twenty-First Century, 1984). It needs to be recognized that the ubiquitous experience of specialty clerkship rotations in medical school reinforces early career differentiation, and efforts need continuously to be made to balance this tendency with concepts in general, comprehensive care for patients, their families and their communities.
4. Institutions should intercede to strengthen and expand the primary care residency programs under their sponsorship since these bring unique assets to rural medical care. It should be recognized, however, that such specialties as surgery and obstetrics can provide a considerable amount of primary medical care in rural communities.
5. Rural preceptorships, appropriately placed in the curriculum, can have a genuine impact on general professional education and on rural practice decisions (Bruce, 1972). The educational goals and objectives of the preceptorships need to be carefully defined, and the medical school must train the practicing physicians who serve as preceptors so that they can best achieve their objectives. The evaluations of medical student performance in rural rotations should be done as objectively as in the other clinical clerkships.
6. Outreach efforts and satellite educational opportunities, other than preceptorships, are important supplements to the medical curriculum (Bruce and Norton, 1984). Those states which have Area Health Education Centers (AHECs) are fortunate in that valuable courses can be taught by a mix of full-time and part-time faculty members in a "controlled" clinical environment outside the University Medical Center. It has been a common observation that there is a fear of leaving the nest on the part of many new graduates. These physicians grow easily accustomed to the vast resources of diagnostic and therapeutic services, the sophisticated equipment, the library-computer networks, the horde of specialist consultants, and the intellectual challenge of harnessing these resources to the needs of interesting patients who drift into the academic center. Rotations to off-campus community hospitals can provide valuable insights into the world of private practice, and young physicians frequently are amazed to learn that there are superb doctors and facilities outside the University, that the patients and clinical problems are every bit as interesting and challenging as those they've seen in the large urban teaching hospitals.
7. Medical students should have an opportunity to become meaningfully involved in rural planning and development (Johnson, Norton and Bruce, 1980). They make excellent and conscientious consultants (voluntary to communities who are trying to recruit physicians). As bright, perceptive observers, they can readily identify those activities in the recruitment efforts of a small town that help or hinder in attracting good young physicians. They not uncommonly get caught up in the community efforts and make personal career changes to respond to future recruitment thrusts of their "adopted" towns.

RETENTION CONSIDERATIONS

Recruiting physicians to small towns and rural areas is probably easier than keeping them there. In Arkansas, studies have demonstrated an inverse relation of physician mobility to the size of the community (Norton et al, 1978). Prior to 1975, towns with less than 1,000 population had an incredibly high turnover of physicians within two years (60%), towns between 1,000 and 5,999 population lost about 40% of their doctors within two years, and towns between 6,000 and 14,999 gave up

nearly a third of their new recruits within two years. This dismal record seemed due in part to the inadequate skills and attitudes given the graduates by their medical school, and in part to the lack of adequate support from the community for the physicians. The following suggestions might serve to address these problems.

1. The medical school curriculum should be modified to be more supportive of rural practice needs. This does not mean setting up new courses or clerkships to be called "Rural Medical Care" or "Rural Sociology." It does mean incorporating into the existing courses and clerkships those concepts of the behavioral sciences, the humanities, of nutrition, gerontology, health promotion and rehabilitation that are needed for primary rural care. It means the systematic development of a series of case studies, lab experiments, demonstrations and seminars that reinforce and sensitize the students to meaningful rural health issues. Ambulatory care experience for children, adults or families, as an example, is considered mandatory for a general professional education. A description of the goals which might be included in such a senior-level course is as follows
 - Become familiar with the concept of primary care.
 - Perform clinical assessment and problem-solving in an atmosphere of patient continuity.
 - Relate patients and their medical problem(s) to their families and their communities.
 - Appreciate the concepts of quality assessment.
 - Recognize the importance of good medical records in the primary care setting.
 - Know critical aspects of the health care delivery process, including patient access to providers and efficient utilization of resources (the medical team, the medical facility, consultants, support facilities and the community) in maintaining or returning patients to their desired levels of function.
 - Provide awareness of the importance of health education as a part of continuous and comprehensive care.
 - Become aware of legal and ethical decision-making in primary care.
 - Incorporate the principles of epidemiology into clinical medicine.

It can be seen that nowhere in this outline of goals does the word "rural" appear; that is deliberate. It reflects a desire to avoid a marketing approach that potentially could oversell and backfire. It should be obvious, on the other hand, that the vital building blocks for a rural practice are built into the very structure of such an educational experience.

2. The medical school should become directly involved in community medical development and consultation. Few people in small towns have an appreciation of the elements that comprise a viable and stable health system in a rural town. Community leaders must understand the need to have more than one physician, the need for well-trained nurses and pharmacists, the need for clinic/hospital facility loan funds from banks and other financial institutions, the need for a strong governing board for the local hospital or nursing home, the need for regional planning for emergency services and complex medical care. The smaller a community is, the more it needs to develop a leadership group to provide assistance, advice, and moral support to the health professionals that have been recruited.
3. The University in a broad sense needs to assist in total community development. A thriving health care *system* cannot survive long in a town that is dying economically. The social, racial, religious, industrial, educational and recreational health of a community frequently is a mirror to the health of its medical care system. Small towns often do not know of resources for consultation and development that are available at the county, state and federal level. To the extent possible, the strengthening of health care needs to be

paralleled by improvements in public education, transportation, communications and in overall economic development. Finally, a realistic sense of community pride and achievement can go a long way to achieving each of these goals. The University can be a valuable asset in achieving total community development through its knowledge of these other resources.

4. For the professional who is isolated in a small town, the medical school and the county or state medical society can help develop valuable support systems. The Continuing Education programs of the University Medical Center can help maintain the skills of the rural practitioner. Good regional systems allow the intimacy of immediate telephone consultation, of referral, of collegiality. The exchange visits of faculty/housestaff/students can be valuable assets in the exchange of ideas and of personal growth; University assistance in finding a *locum tenens* so that an isolated physician can get some vacation time with his family or attend a medical meeting can be an enormous help.

The long range viability of a rural health care system requires more than the usual and customary approach to recruiting a new physician for the small town. The physician needs special knowledge, skills and attitudes to practice excellent rural medicine, and the community needs more than the usual assortment of support services to effect the proper match. The text above, outlines some of the ways in which medical schools and their parent universities can facilitate this coupling process.

physician assistants . . .

Charles G. Huntington

Mid-level health care providers were developed in response to a geographic and medical specialty maldistribution of primary care services. When the availability of health care services is conceptualized in terms of the consumers of these services or in terms of the services themselves (as opposed to the distribution of health care providers) then health policy will achieve its goals only when redistribution strategies make health care services more readily accessible (Ball, 1974). Once the emphasis is placed on services it becomes apparent that a number of different providers may perform the same services.

A report by the Director-General of the World Health Organization which accompanied a resolution passed by the 24th World Health Assembly called attention to the need to train and deploy new categories of health personnel. It stated that the "acute shortage and maldistribution of professional health personnel, not only in developing but also in developed countries, make it necessary to train large numbers of auxiliary personnel to serve as 'multipliers' of the professional staff. The role of auxiliary health personnel thus has a two-fold aspect: to relieve professionals of simple tasks which do not necessarily require their level of competence, and to cater to a population which would not otherwise be covered by health services" (Acuna, 1977, p. 190).

Physician assistant (PA) programs have achieved notable success in training and deploying PAs to provide primary care services in rural areas. Among the ranking criteria for grants made to PA programs by the Bureau of Health Professions of the Public Health Service is having a program and effective mechanism for placing graduates in underserved areas. PA programs require of their students rural community health rotations.

Data collected in 1981 by the Association of Physician Assistant Programs indicate that 45 percent of the over 6,000 PAs surveyed were practicing in towns with a population of 50,000 or less and that 26 percent were in towns with a population of 10,000 or less (Carter, Perry and Oliver, 1984). The percentage of PAs located in towns with a population of 10,000 or less has remained constant since the first survey of the profession in 1974. Thirty percent of the PAs responding to the 1981 survey

were located in medically underserved areas, and 14 percent were practicing in satellite clinics. A larger majority (77%) of the respondents were providing primary care — 57 percent employed in a family practice and an additional 21 percent employed in the other primary care specialties. The 1981 survey also revealed that those PAs who worked in a family practice in rural settings were more satisfied with their jobs than those PAs who worked in other specialties in larger communities. The Physician Extender Reimbursement Study, which was financed by the Health Care Financing Administration, found that PAs in rural areas tended to see more patients, spend more time in direct patient contact, generate larger incomes, and charge less per patient visit than did their urban counterparts (Mendenhall, Repicky and Neville, 1980).

The MEDEX model of PA education has traditionally had the greatest success in deploying graduates in rural areas. MEDEX programs utilized a one-year curriculum which included a three to six month didactic phase followed by six or more months in a field preceptorship where a majority of graduates continued to practice. Specific factors which contributed to the successful rural deployment of MEDEX program graduates included the identification and education of physician preceptors who were willing to make a commitment in advance to both train and employ a student; student selection criteria which included previous primary care experience and rural living experience; the utilization of experienced rural PAs for teaching and as role models; and the extensive education of the practice staff, local physicians, local pharmacists, and hospital administration, nursing, and medical staffs on the background, training, and expected role of the PA (Segal, et al., 1977).

The tendency of PA program graduates to remain near the site of their medical training led the Stanford-Foothill Primary Care Associate Program to develop a program of decentralized training (Fowles, et al., 1983). Decentralization consisted of replicating student recruitment, admissions, and classroom and clinical instruction in five designated areas of California, each of which was within or adjacent to an area needing additional primary care services. A community college within each area recruited applicants, participated in the selection of students, and provided preclinical courses. A physician leader was designated in each community and, after being given a clinical appointment at Stanford University, participated in the admissions process, did some clinical teaching, and served as a liaison with the local medical community. As the decentralization program developed, graduate PAs in the five areas assumed roles as local program coordinators. Student evaluations were developed at the central institution in order to maintain quality control, but were administered at each training site.

The decentralized pattern of deploying students used in the Stanford-Foothill program clearly demonstrated the association between the site of training and the eventual location of practice. None of the students participating in the totally decentralized program chose a practice site in the area of the central institution. In addition, decentralization resulted in a wider base of student recruitment, a greater variety of people participating in the educational process, a dispersion of preceptorship sites, and new employment possibilities. These changes were achieved without affecting educational standards.

A set of factors which seem to influence the rural deployment of graduates of PA programs has emerged in the literature. For example, student selection criteria should include previous primary care experience, previous rural living experience, and the intention to provide primary care in a rural area. Primary care and rural living experiences serve to ensure a knowledgeable expression of intent to enter rural primary care. Recruiting students from rural areas and then providing both their didactic and clinical training in rural areas serves to minimize the disruption of student lives during the educational process. This is especially important for PA students, most of whom are entering second careers and already have family obligations. The decentralization of didactic training requires a great deal of travel and community action on the part of the PA program central staff and may be difficult for many programs. When the didactic phase is conducted at a central

institution, the curriculum should include course work on both rural health problems and the sociology of rural living. These courses might initially be developed by utilizing graduates with rural primary care experience. Program graduates can also be utilized in developing rural clinical rotation sites. The experience of MEDEX and other PA programs indicates that clinical training can be successfully conducted in rural areas without sacrificing the quality of education.

Traditionally PA programs have provided generalist training which has allowed for a flexible utilization of graduates in both primary care and specialty employment sites. This generalist training has been especially appropriate in providing the skills necessary for rural practice. Despite an increased demand for PAs in specialty and institutional settings, PA programs should continue their generalist orientation leaving specialty training to be conducted on the job site.

Several factors external to PA education have influenced the utilization of PAs in rural areas. The successful rural deployment of PAs is largely dependent on the availability of rural physicians who are willing and able to provide responsible supervision. The shared training experiences of students from multiple professions serve to instill the team concept of health care. Encouragement can be found in the increased likelihood of younger physicians to hire a PA (Fowles, et al., 1983).

The flexible utilization of PAs in meeting health care needs in rural areas is in no small way tied to state regulations governing PAs. Overly restrictive laws, especially those requiring continuous, on-site physician supervision, serve to discourage the utilization of PAs in extending physician services. The deployment of PAs in satellite clinics is currently permitted in only twenty-four states¹, and only fifteen states grant PAs limited prescription-writing privileges². The experience of states with relatively liberal PA laws demonstrates that patient safety is not jeopardized when PAs can be flexibly utilized in meeting the health care needs of a community. While PA laws should always clearly tie the PA to a supervising physician, overly restrictive laws should be liberalized.

A review of the literature clearly indicates that the techniques for adequately preparing PAs for rural practice have been well developed. Better preparing PAs for rural practice, then, is largely a matter of commitment to improving access to health care services in rural areas. With the proper commitment, traditional medical education models can be amended and decentralized in a manner which both better prepares PAs for rural practice and better prepares rural health care systems for PAs.

nurses . . .

Peggy Guess Lassiter

Rural nurses and educators in rural nursing are in the process of delineating the aspects of rural nursing that are distinct from other forms of nursing practice. The writing of this article and readers' reactions to it are part of the process to help clarify perceptions and experiences and, therefore, what follows should be viewed as a preliminary attempt to describe the unique functions and necessary educational preparation for rural nursing practice.

Rural nursing is distinct from other forms of nursing practice in that it demands a wide range of knowledge, skills and appropriate attitudes for successful practice. It is based on established nursing principles and their application within rural cultures and also demands advanced skills and knowledge beyond basic education. Many of

¹The following states allow Physician Assistants to practice in satellite clinics: Alaska, Arizona, Colorado, Connecticut, Florida, Hawaii, Iowa, Kansas, Maine, Maryland, Michigan, Montana, Nevada, New Mexico, New York, North Carolina, Oklahoma, Oregon, Pennsylvania, South Dakota, Utah, Washington, West Virginia and Wisconsin.

²The following states have prescriptive privileges for Physician Assistants: Alaska, Arizona, Colorado, Maine, Massachusetts, Michigan, Nebraska, New Mexico, New York, North Carolina, Oregon, Pennsylvania, South Dakota, Washington and Wisconsin.

the advanced skills required are of equal importance in urban settings. Rural nursing differs from urban nursing, however, in the diversity of knowledge needed. The rural nurse is frequently a lone health practitioner, referral and consultation resources are not readily available. Rural clients are highly influenced by traditional community and family values and communities are often geographically isolated. As a consequence, the rural nurse must be highly skilled, understanding and independent in health assessment, promotion and treatment. Planning for health must take place with families, groups and communities as well as with the individual client. Urban nursing does not require of one person such diverse functions as emergency care, management of a primary health care center, community health assessment, leading health promotion groups, and health care with migrant workers. Diversity of functions and application within a rural context make rural nursing distinctive.

Programs in rural nursing education must specify and build on the unique aspects of rural practice. They must prepare students with the knowledge, skills, and attitudes appropriate to the complex of needs in the rural community. The following areas of content are considered essential in rural nursing education: basic nursing, rural health needs, community health assessment, rural groups and families, rural cultures, leadership and administration, and change theory. Each content area contains concepts which add to a general knowledge of rural nursing and skills which enable the nurse to bring about healthful change.

BASIC NURSING

Rural nurses must have mastered the wide range of knowledge and skills for individual health taught in undergraduate educational programs. Diagnosis, treatment, teaching, emergency care, rehabilitation, referral, counseling, health promotion and disease prevention are all necessary in rural settings. Often the rural nurse is involved in these functions for individuals of all ages. Such basic content represents the first level of preparation for rural nurses.

However, successful rural nursing requires more than basic nursing skills and knowledge. The additional preparation which is necessary for successful rural practice is described by the following six topical areas. Such content may be acquired in a graduate nursing program and through in-service education for individuals already practicing in rural areas.

RURAL HEALTH NEEDS

Rural nurses must learn how and why rural health needs are distinct. Some needs that are particularly rural stem from the unavailability and unacceptability of health services, isolation and transportation hardships, environmental risks from waste and toxin pollution, farming accidents and family violence. Density of population and distance from the closest metropolitan area are variations of rurality that influence health resource accessibility and dramatically affect health. Kin and friendship networks in rural area provide strong sanctions regarding behaviors as does the degree of ethnic concentration. These social networks also have a strong influence, both positively and negatively, on health practices. For many rural areas, drinking water is threatened by inadequate waste disposal systems. Both pesticides and toxic waste dumps can create hazards. Stress for rural people is frequently high and may lead to increased violence, alcoholism, and accidents. Government, religious, and economic/welfare systems influence health needs as in all communities; however, rurality, in turn, influences each of these systems and brings a unique dimension common to rural areas.

COMMUNITY HEALTH ASSESSMENT

Rural nurses need community assessment skills as well as assessment skills for individuals. Community health assessment, important in health planning for all

communities, is a crucial skill for rural nurses because of their central function in planning — often the rural nurse is the only health professional practicing in the community. In urban areas, nurses may emphasize an advanced specialty and rely on other nurses for selected advanced skills. Rural nurses, as lone practitioners, must be able to assess community health priorities through community study. Health can be conceptualized as the physical, social and emotional well-being of a community. Each component of that community — the individuals, families, established groups, and organizations — interact to affect health. Although an individual practice may focus on particular community components, the rural nurse must make a broader assessment of health concerns, resources for service, and an analysis of how each part of the community interacts for health.

The rural nurse must work as a partner with the community in identifying and seeking to fulfill health needs. Such a participation process leads to rural community support for health programs. Assessment involves the gathering of data from existing sources, from interviews, observation, and participation with rural clients. The interpretation of data with community help results in setting health priorities, establishing goals, and planning steps of action for the nurse and the community. Close partnership with community leaders and their community representatives insures a health action plan which is built upon assessment data and fits the community's needs and priorities.

RURAL GROUPS AND FAMILIES

Rural nurses need an expanded knowledge of family and group dynamics which includes group structure, function, development, and communication. Such knowledge enables the rural nurse to successfully work with groups for desired healthful changes. Rural communities are comprised of strong family and kin groups as well as other established, interacting groups such as churches and rural cooperatives. These groups provide support to individuals. They guide members in decisions. They provide strong sanctions for behavior and even influence members' definition of health and solutions to health problems. Rural nurses must understand such groups and how to work with them in order to help meet health needs for group members and to utilize the groups positively for the attainment of community health goals.

Rural families vary from urban families in size, composition and work force participation (Brown, 1981). Rural people marry earlier, have more children, and live in larger households. Moreover, the labor force participation of rural women is lower. While kinship ties are important for both urban and rural families, rural families are more likely to be stable as shown by lower divorce rates and higher fertility rates (Beale, 1978). In addition, the primary groups and social networks are considered relatively more important in rural than in urban areas (Hassinger, 1982). The influences of rural families and rural groups are of key importance to health care.

RURAL CULTURES

Successful nursing in any setting involves an understanding of and sensitivity to cultural factors. Rural nursing education must include a study of rural cultures as learned from rural people. Culturally oriented interviewing and analysis of interview data are necessary as a means of learning from people their views of their lives, the meaning of life to them, and its effect on their behavior and health. Such culturally oriented interviewing involves a close attention to language. With this knowledge, the rural nurse becomes aware of attitudes, values, standards, and patterns of linkage between people in rural communities. An understanding of the particular culture leads the nurse to appreciate and encourage local leadership and beneficial health practices. Attractions and tensions among people, the influence of kinship and group ties, and existing means of decision making are valued. The rural nurse offers help within these rural networks. Rural nurses may design acceptable and effective health services with an understanding of and respect for rural cultures.

LEADERSHIP AND ADMINISTRATION

Knowledge and skill in leadership enables the rural nurse to become an appropriate source of support, direction, and consultation in health matters. The nurse's expertise is needed both to support the leadership functions of others and to lead community groups and organizations. Because of the small scale of operation in most rural health settings, nurses must often fill administrative roles in clinics, hospitals, and health centers. Skills ranging from budgeting and fund-raising to hiring and maintaining staff are required. Rural nursing education must include an exposure to the concepts and skills of leadership, management and administration. Practical approaches to these functions should be taught as well as theories of leadership and administration.

CHANGE THEORY

Rural nurses must appreciate the dynamics of planned change as it relates to the community and its members. Changes for improved health involve both opportunity and risk to people. Progress toward healthful goals is encouraged by some community attitudes and beliefs yet hindered by others. Such forces for and against change exist within individuals, within families and other influential groups, and within the rural community and surrounding region. Analysis of these forces and their effect on the rural client assists in the selection of goals and steps of action toward change. Knowledge of change theory also promotes patience and hope since resistance to change is seen in the context of growth and movement toward the chosen health goal.

Success in rural areas is also determined in part by the attitudes, beliefs, and values of the practitioner. Nurses selecting rural practice bring diverse perspectives and motives to their work, some of which facilitate and others which hinder their efforts. Satisfaction and frustration are experienced when living and working in communities which are disadvantaged through geographic isolation, economic depression, or a lack of service resources. Cultural differences between health service providers and rural residents may produce mixed effects on joint efforts.

Education for rural nursing practice must include fieldwork in rural communities in order to learn from rural residents and to test one's ability to join them in partnership for improved health. Students must be supported in their personal examination of beliefs, attitudes and values relative to rural work. Though attitude characteristics predictive of successful rural practice have not been fully studied, successful rural nurses seem to be described by attributes of independence, flexibility, creativity, and an enjoyment of the rural environment and life style. Successful rural nurses report being able to mix easily with rural people and to integrate their work for improved health into other areas of community activity.

Nurses with varied levels of preparation are needed in rural practice. Because rural nurses function in many integrated health roles, it seems only appropriate to provide educational programs which prepare them for expanded rural practice. But where are those with basic nursing skills to find educational programs specific to rural practice? Rural nursing education is presently offered in only a small number of graduate programs. Other graduate programs arrange for rural practicums or rural health courses within non-rural majors. However, many nurses presently practicing in rural areas are unable to pursue graduate work. This suggests a need for continuing, as well as graduate, education in rural nursing.

Education for rural nursing at both the graduate and in-service levels must address the particular health needs of rural people, the partnership of the nurse with rural residents, and those multiple nursing skills required to meet rural priorities. Rural nurses are key resources to rural health. Their capabilities are realized fully when they are trained for this expanded practice.

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PETER A. KELLER, Ph.D, is Professor and Psychology Graduate Coordinator at Mansfield University of Pennsylvania. He is coeditor of the *Handbook of Rural Community Mental Health* (Human Sciences Press, 1982) and Chair of the National Association for Rural Mental Health (1983-1985). Dr. Keller also is coeditor of an annual mental health series entitled *Innovations in Clinical Practice* (Professional Resource Exchange).

MICHAEL C. HOSOKAWA, Ed.D., is a professor in the Department of Family and Community Medicine at the University of Missouri. Dr. Hosokawa is director of graduate studies in public health. His most recent publication, "Osteopathic Physician Location and Specialty Choice" (*Journal of Medical Education*, August 1984) studied the reasons osteopathic physicians choose rural primary care.

THOMAS ALLEN BRUCE, M.D. is Professor of Internal Medicine and Dean of the College of Medicine, University of Arkansas for Medical Sciences. Dr. Bruce has served as director of his school's Rural Medical Research office and has participated in several national and Far Eastern efforts to upgrade rural care. He is co-author of a new book, *Improving Rural Health: Initiatives of an Academic Medical Center* (Rose Publishing, 1984).

CHARLES G. HUNTINGTON is a physician assistant who practices in Hermon, New York, a town of 1,200 residents located 140 miles north of Syracuse. He received his bachelor's degree from Williams College and his PA training at the Bowman Gray School of Medicine. He is a past president of the New York State Society of Physician Assistants and is the immediate past president of the American Academy of Physician Assistants.

PEGGYE GUESS LASSITER, MSN, RN, is an Assistant Professor at the University of Virginia School of Nursing where she has been instrumental in developing the content for a master's program in rural community health nursing. This new master's program is the first in the nation to focus specifically on community health nursing in rural areas. Ms. Lassiter's most recent publication is "Working with groups in the community" in Stanhope, M. and Lancaster, J. (Eds.) *Community Health Nursing: Process and Practice for Promoting Health*. St. Louis: C.V. Mosby, 1984, pp. 361-378.

But Little Is Being Done

Farm Health Woes Grow

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America's largest and most productive business - agriculture - is slowly getting sick and government is doing little to make farmers well.

"Unless something is done - soon, a very valuable resource - the American farmer - is going to be in trouble," said David Baker, a farm safety specialist at the University of Missouri.

Trouble already is at the door. Just last year, farming surpassed mining as the nation's most dangerous job, according to the National Safety Council. Fifty-five of every 100,000 farmers died in on-the-job accidents in 1983, five times the national average. The cost of farm accidents to the economy was more than \$5 billion.

That's just the beginning. The council's figures do not measure the more insidious health threats now afflicting agriculture. Those hazards, which scientists are just beginning to document, include leukemia and other cancers, hearing loss, stress, farmer's lung, hog lung and other maladies.

The farmer's mounting health woes - an offshoot of the industrial revolution on the farm - have received only scant attention from state and federal agencies, health officials and the public. The few programs that do exist to help farmers are uncoordinated, underfinanced and generally have accomplished little to deal with the growing toll of sickness and accidents on the farm.

"There are no preventive programs to deal with these occupational problems," said University of Iowa associate professor Kelley Donham before the Joint Economic Committee of Congress last year. "Therefore, they may be expected to continue and their economic significance is likely to increase."

Donham told the lawmakers, "An effective program to protect the farmer has fallen between the cracks of various federal and state agencies." Here are some examples:

- * The Occupational Safety and Health Administration, which is charged with protecting the health of America's workers, never sets foot on most farms.
- * The U.S. Department of Agriculture (USDA), the farmer's traditional ally, largely ignores farm health problems. Its safety program is short on money, manpower and training.
- * Large federal research agencies, such as the National Institute for Occupational Safety and Health, often overlook farmers because they have less political clout than other worker groups.
- * So little information is gathered about farm health and safety by government agencies that scientists still don't know the scope of many problems.

The deteriorating health on the farm has prompted a call for stronger medicine. The therapy would include a heavy dose of research, better training for rural physicians and safety specialists, the creation of a farm-health

| Industry | Workers in (thousands) | Deaths | Death Rate per 100,000 | Disabling Injuries | Injuries per 1,000 |
|--|------------------------------|--------|------------------------------|-----------------------|-----------------------|
| All Industries | 100,100 | 11,200 | 11 | 1,900,000 | 18 |
| AGRICULTURE | 3,499 | 1,399 | 86 | 399,000 | 86 |
| Mining, quarrying | 1,000 | 600 | 60 | 40,000 | 40 |
| Construction | 5,400 | 2,000 | 37 | 200,000 | 37 |
| Manufacturing | 19,000 | 1,200 | 6 | 340,000 | 17 |
| Transportation and Public Utilities | 6,300 | 1,300 | 25 | 140,000 | 25 |
| Trade | 22,700 | 1,100 | 5 | 330,000 | 14 |
| Service | 27,800 | 1,700 | 6 | 370,000 | 13 |
| Government | 15,700 | 1,500 | 10 | 280,000 | 17 |

Source: National Safety Council, preliminary 1983 figures.

lobbying group and the development of a national health and safety policy for agriculture.

One of the loudest cries is for more research. "Agriculture is really the last frontier for occupational safety and health research," said James Merchant, director of the University of Iowa's Institute of Agricultural Medicine. "There's been a real lack of information about the problem."

But for now, the important questions remain unanswered. Does breathing hog dust and manure gas lead to permanent lung damage? What are the most common causes of farm accidents? How widespread is farmer's lung disease? Do pesticides trigger such cancers as leukemia and lymphoma in farmers?

"These chemicals kill birds and everything else. Why wouldn't they be hard on humans, too?" asked Kathryn Dawes of Adel.

Last year, her husband, Harold, a farmer, died of lymphoma. He was 63. "He always felt his sickness came from the chemicals," she said. "And I thought it was connected, too."

Scientists haven't had much luck squeezing money from federal agencies for farm health research. They say farmers, with less than 5 percent of the population, will never rivet the attention of Congress. As one scientist put it: "The wheel that squeaks the loudest gets the grease."

"Farmers aren't very well known to the scientific community and the funding agencies," said Keith Long, former director of the U of I's Institute of Agricultural Medicine. "And their population isn't large. So it's much more difficult to get funds to study their problems."

Farm health research, said Donham, "hasn't been a likely funded item because there is no consolidated group in agriculture to draw attention to these issues. Most research is awarded to occupational groups that have political clout."

There's another problem. Until scientists can document a health threat, the government isn't likely to spend money on it, and farm health researchers don't have the money to document the problems.

"It's like the old story of the kid who gets out of school and can't get a job because he doesn't have experience because he doesn't have a job."

Some work is being done. For example, Merchant received a \$45,000 grant in 1983 to study the use of

(Continued on page four)

RURAL HEALTH IN CHINA

There is still time to sign up for the ARHA sponsored tour of the People's Republic of China, August 26-September 18, 1985. "The purpose of the trip is to examine Chinese health policy, medical education, and health care delivery, especially as they relate to rural health," explained Beverly Rowley, the ARHA board member who is coordinating the study tour.

"We will look at rural health on a number of levels," Rowley continued, "including the commune clinic and hospital, district hospital and medical school. By the end of the tour we should have a solid overview of the function and operations of the various levels and how they relate to one another."

There will be opportunities for professional exchange, including discussions of mutual problems and their solutions, questions and answers, and even formal presentations. Sightseeing at significant historical and cultural sites will be included in each city, with evenings devoted to cultural performances, and ample time for shopping.

The itinerary will include visits to Shanghai, Suzhou, Chengdu, Xian, Urumqi, Beijing and Hohhot, equivalent to covering areas as diverse geographically and culturally as from Miami to Little Rock; Kansas City to Seattle; and Montreal to New York City.

"We will have access to rural health care facilities not ordinarily open to Westerners," said Rowley, who explained the guide and interpreter will be a former barefoot doctor currently doing graduate work at a university in Shanghai.

For further information, call or write Dr. Rowley, Office

of the President, Eastern Virginia Medical Authority, P.O. Box 1980, Norfolk, VA 23501 — 804 446 6025.

FARM CONT'D

respirators among farmers. Donham is working on a \$21,753 project with the American Lung Association on farm respiratory problems.

But many important areas are not being studied much. For example, there's hog lung, an ailment that strikes many swine confinement workers. In 1983, University of Iowa researchers submitted a grant proposal to the USDA to study air quality inside confinement units. The grant was turned down.

"I don't think we've ever had any funding from the USDA," Donham said. "The agency is 90 percent production-oriented. That's its orientation. Health is not."

WINDY CITY CONT'D

marine or climb 50 feet down into a re-created coal mine. Fourteen acres of exhibits are mind-boggling. And if your head is in the clouds there's the Adler Planetarium.

Blackhawks, Bulls, Cubs, White Sox, thoroughbred racing, Comiskey Park, Wrigley Field, the Bears, need we say more! (Cubs vs. St. Louis June 14 at 3 p.m.)

There's some distinct neighborhoods, the Italian, the Greek, the Ukrainian Village, but mostly there's a hodgepodge of Asian, European and South American cultures that colorfully blend. Here you can try out your college German, Spanish or French when you're ordering *spätzle*, *Pasta valenciana* or *escargots* and other exotic foods.

A Study of Health Manpower in Georgia

by

**J. Stephen Wright
Adam Jablonowski
Karen Butler
Evangeline Hebbeler
Jody A. Hunter**

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Executive Summary

This statewide manpower study was conducted to develop baseline information on the geographic distribution of health professionals in Georgia. Data on the county of residence of providers in 13 of the health professions (1983) were collected from the State Examining Boards, the agency of licensure in Georgia. These data were aggregated by 1) Metropolitan Statistical Areas (MSA) and Non-MSAs, 2) Metro Core and Suburban, Non-Metro Adjacent and Non-Adjacent counties, and 3) County Population Size.

The professions studied are:

- chiropractors
- dentists
- occupational therapists
- opticians
- optometrists
- pharmacists
- physical therapists
- physician assistants
- physicians
- podiatrists
- psychologists
- registered nurses
- speech pathologists and audiologists

These professions were selected based primarily on the accessibility and availability of the manpower licensure data and the role they play in the health care delivery system.

The major findings of the study are summarized below:

1. The metro ratio of professionals-to-populations was greater than the non-metro ratio in all professions except for optometrists. This differential was at least three-fold for five professions (occupational therapy, psychology, speech pathology/audiology, podiatry and physical therapy).
2. Comparing the rate of professionals residing in MSAs and non-MSA:
 - The highest rate was either Augusta or Atlanta MSAs in nine of the thirteen professions.

- With Non-MSAs, the Central Georgia Non-MSA had the lowest rate in five of the thirteen professions, followed by Southwest Georgia Non-MSA in four professions.
- Except for optometrists, the difference between the highest and the lowest rates ranged from two to forty times.

3. By metro proximity, the highest rate (professional-to-population) in each of the professions was found in either the Metro Core (10 professions) or Metro Suburban (3 professions). The lowest rates were found predominately in Non-Metro Adjacent (8 professions) or in the Non-Metro Non-adjacent (4 professions) areas. The differences between the Metro Core and Non-Metro Adjacent rates ranged from no difference for optometrists to a six-fold difference for occupational therapists and an eleven-fold difference for speech pathologists/audiologists.

4. When analyzed by size of county population, the distribution pattern generally had the highest professional-to-population rate in the group of counties with 150,000 and above population. The rates decline as the size of the county population decreased. The lowest rate was in the below 10,000 population group. This linear pattern was present in all professions although three professions exhibited minor variations.

5. Physicians and registered nurses were also analyzed with respect to previous inventory data which were available from past studies. With both professions, there was a considerable maldistribution in the earlier period which decreased only slightly by 1983.

6. Due to the relationship in the demand for nurses and the number of inpatient beds, registered nurses were analyzed in relation to the number of general hospital and nursing home beds available in each area. There was almost half the number of nurses-per-bed in non-metro counties as in metro counties.

7. Recommendations are made that comprehensive health manpower data collection, analysis and planning be conducted on an ongoing basis in the state.

In summary, there is a chronic and severe geographic maldistribution of health professionals living in the state of Georgia. It is evident that an ongoing manpower planning program should be established to study and monitor changes in the geographic distribution of professionals and that new and innovative approaches to solve maldistribution problems should be taken.

Health and Demographic
Characteristics of Georgia:
Rural/Urban and North/South

J. Stephen Wright, PhD, Statesboro
Owen F. Gaede, PhD, Statesboro
Dale W. Lick, PhD, Statesboro*

*Dr. Wright is Director, Office of Rural Health, Dr. Gaede is Director of Planning and Computing Services, and Dr. Lick is President, Georgia Southern College.

Address reprint requests to Dr. Wright, Box 8148, Georgia Southern College, Statesboro, Georgia 30460.

CONCLUSION

Rural Georgia is truly a "health disaster area." People are dying faster than the state average from all of the major causes of death. The mean crude death rate is 47% higher in rural counties than in metropolitan counties. Many different causes of death contribute to the higher rural death rates.

With significantly higher death rates than expected from the major causes of death, the need and demand for health care professionals in rural Georgia must be great. However, in contrast to the apparent need in rural counties, manpower studies reveal critical shortages of physicians, nurses, dentists, and many other health professionals in rural Georgia(9).

High mortality statistics coupled with an older, poorer, less educated population present a devastating picture of health in rural Georgia. Shortages in practically all the health professions can only aggravate an already bad situation due to the lack of cars available to the residents.

The statistics from north/south also revealed differences in health and demographic factors. In general, north Georgians were better educated, had a lower percentage of poor people, and a lower percentage of population over 65 years. This pattern is consistent with the lower death rate found in north Georgia. However, the much lower median age in south Georgia is a factor inconsistent with the higher south Georgia death rate. Health professionals are also less available in south Georgia(9), providing proportionately less care to a sicker population.

Are there simple solutions to these problems? The answer is, obviously, no. Some action is now being taken: at least two health manpower educational programs targeted specifically to rural areas, federal and state scholarship

programs, the U.S. Department of Health and Human Service's rural health initiatives, and the Georgia Department of Human Resources' primary care efforts. However, much more needs to be done, including expanded health professional educational activities and research on rural health problems. Health promotion and disease prevention programs aimed specifically at the respective rural problems should be expanded.

*Report of the
Graduate Medical Education National Advisory Committee*

to the Secretary, Department of Health and Human Services

Volume III
Geographic Distribution
Technical Panel

U.S. DEPARTMENT OF
HEALTH AND HUMAN SERVICES
Public Health Service
Office of Research Administration

VARIABLES

MAJOR FINDINGS

E. General Background
and Sociodemographic
Characteristics

1. Geographic Origin

The AAMC Longitudinal Study of Medical School Graduates found that once specialty differences are taken into account, only background characteristics, particularly the size of community lived in most of life, are significantly related to location choice (1979). Long reports several studies which have determined that physicians are more likely to locate their practice in communities whose size resembles those in which they lived prior to attending medical school (1975). Hassinger also reports that rural as well as urban primary care physicians were likely to return to practice in places similar in size to where they were born (1979). The probability of choosing a given practice location increases with the amount of prior contact, including place of birth (Yett, 1973). Hassinger found that selection of a practice site is based on preferences developed in the socialization of early years and altered through training and career experiences (1979). Weiskotten's study of U.S. medical school graduates for the period 1915-1955 concluded that all prior location factors influenced a physician's location choice (1960).

Senator ABDNOR. Thank you, we will do that in a little bit if we have time. Your figures are very, very revealing, Mr. Wright, I assure you.

The next gentleman is a fellow who has probably not had time to do the research, he is too busy doing the practical things. He does not carry the name "Doctor" but he is a very important person in health services out in western South Dakota where people come to him from over 50 miles away. He is a physician assistant and has done wonders for our rural State because you are talking about the rural of all rural in this case. I know that Dave can give us some very valuable input.

STATEMENT OF DAVID CUSTIS, R.N., WALL CLINIC, WALL, SD

Mr. CUSTIS. Thank you, Mr. Chairman.

As the Senator said, my name is David Custis. I am a registered nurse, nurse practitioner, and physician assistant. I am employed by the Wall Rural Ambulatory Care Clinic in Wall, SD. Wall is a small village of 929 people at the edge of the Black Hills in western South Dakota. I work with Dr. Robert Hayes who is unable to be here today because of recent cancer surgery from which he is recovering.

Concern for providing health care to rural areas in South Dakota prompted the 1975 legislature to appropriate \$60,000 for the development and implementation of a program for physician assistants.

In its charge, the University of South Dakota School of Medicine developed a new program under the direction of Dr. Robert Hayes. The plan called for physician assistants to be located in Wall, Murdo, and White River with Dr. Hayes supervising all three physician assistants from Wall.

Community support for the physician assistants was overwhelming in the small community of Wall. Over the 10-year history of the Wall Clinic, many things have changed. The most significant thing being that the Wall Clinic has grown from a Government supported entity to a nearly self-supporting organization that is providing rural health to a community that cannot afford the full-time services of a doctor or a hospital.

South Dakota's Physician Assistant Law was designed and written to allow physician assistants to provide medical care under the supervision of a physician in isolated rural communities. The clinic now contracts privately with Dr. Robert Hayes as supervising physician and the nine-person volunteer board of directors meets monthly to assist me with the financial affairs of the clinic.

Since our beginning in 1975, we have been able to provide the primary medical care for about 15 patients per day. Our clinic estimates that the clinic has seen somewhere around 38,000 patients since 1975. The area in which the clinic serves is a 6,000 square mile area. Many of these patients have to drive over rough gravel roads to get to our clinic. However, you never hear of any complaints because without the clinic in Wall, many of them would have to travel anywhere from 70 to 100 miles one way to see a health care provider.

Dr. Hayes and myself treat both the young and the elderly. But I believe the best service we provide is the care for the elderly. Here

is an age group in which it becomes more and more difficult to travel long distances to see a doctor, especially when they do not have any means of transportation to take them there. Not only do we provide care at the clinic, but we will make house calls when they are unable to get to the clinic. Last winter, on a cold snowy night, I visited an elderly gentleman in Quinn, SD, 5 miles from Wall, to treat him for flu. The daughter thanked me over and over because it is tough being out in nowhere. Also, last week I treated an elderly lady. I administered IV chemotherapy in her home because she wanted to be near her family and it was hard for her to travel to Rapid City for that therapy.

If any of our patients need to be hospitalized or see a physician, we usually send them to Rapid City which is 52 miles west of us. We try to get the patients to the doctor of their choice. In many cases, we will work with the doctor so the patient will not have to make the long drive back for rechecks. In cases of emergencies our job is to get the patients comfortable and as stable as we can before we move them 52 miles away by ground ambulance.

You see, you Members of Congress did a good job for us in rural America when you authorized the Rural Health Clinic Act and when you also authorized the Emergency Medical Service Act which helped us get our ambulance service modernized and into the 20th century. We have an excellent volunteer ambulance service in Wall which helps our clinic exist. Without an adequate ambulance service, a rural health clinic would not be able to evacuate patients satisfactorily. These two bills you passed in the 1970's are paying off for us in the 1980's.

Under the Rural Health Clinic Act, we are a registered Rural Health Clinic and are able to give care to Medicare and Medicaid patients. We are regularly inspected by the State Department of Health for Medicare. This is done to be certain that we meet the minimum standards for delivery of health care at our clinic. In addition to being monitored by the State Health Department, we also have our own internal review process in our clinic. So, we feel that we give a good standard of medical care. We welcome examination and inspection of our clinic and our work because it gives us a chance to showoff our quality of medical care.

We are also pleased that we have been able to hold the cost down. No matter what we do, the cost of medical care is high enough but our costs are consistently less than average. Our secret is, of course, not to order what we do not need. Our laboratory, EKG, and x rays are used only when needed.

We see a good many tourists in our little village because of the location of the famous Wall Drug Store and other attractions. The tourists come to the clinic with anything from sore throats to congestive heart failure. They are also very thankful for the clinic in Wall, so much that last summer I saw a patient from Chicago with a sore throat. They had heard about the clinic from their neighbor who had been in the clinic the month earlier. The tourists also remarked about how low our charges are.

In summary, I want to thank the Congress and our Senator, James Abdnor, in particular for the support you have provided us through the Rural Health Clinic Act and the Emergency Medical Service Legislation. These two pieces of legislation have gone a

long way in trying to give people in rural America access to quality medical care at reasonable cost.

As a physician assistant, I am proud to be part of that scheme of things. Our problems now are trying to keep up the quality of medical care we are able to give as the new medical technology continues to explode around us. We learn more and are able to do more each day, but all this translates into increased costs. We continue to try to hold the line and use the best of the older acceptable treatments, carefully select the new and more expensive procedures. We will continue to work at the unglamorous job of primary care which is what we do in a rural health clinic. It is what we need out in our country, and our people know.

Last February, when I testified in Freeman, SD a group of farmers were there from my hometown of Scotland, SD. That afternoon, after I testified, my father asked them what they got out of my speech. They all agreed that it was a Federal project that worked. So, thus the rural health clinic is a bright spot in rural America and I would like to thank you collectively and each of you individually for your continued support.

As Senator Abdnor knows, Dr. Hayes, who has done a lot for rural South Dakota was unable to be here, and he put his thoughts and ideas into this speech. He wanted to especially thank Senator Abdnor for all the support that he has given clinics such as Wall.

[The prepared statement of Mr. Custis follows:]

PREPARED STATEMENT OF DAVID CUSTIS
THE RURAL HEALTH CONCEPT

Mr. Chairman, members of the committee, staff and guests. I am David Custis, R.N., Family Nurse Practitioner and Physician Assistant. I am employed by the Wall Rural Ambulatory Care Clinic in Wall, South Dakota. Wall is a small village of 929 people at the edge of the Badlands in Western South Dakota. I work with Dr. Robert Hayes who is unable to be here today because of recent cancer surgery from which he is recovering from.

In attempting to provide the rural areas of the State of South Dakota with primary health care, the 1974 South Dakota Legislature by legislative mandate charged the University of South Dakota School of Medicine with the task of developing and implementing a four-year degree granting Medical School that would place emphasis on Family Practice.

Further concern for providing health care to the rural areas of South Dakota prompted the 1975 Legislators to appropriate \$60,000 for the development and the implementation of a program for Physician Assistants.

In its charge, the University of South Dakota School of Medicine developed the new program under the direction of Dr. Robert Hayes. The plan called for Physician Assistants to be located in Wall, Murdo and White River with Dr. Hayes supervising all three Physician Assistants from Wall.

Community support for the Physician Assistant's program was overwhelming and a local volunteer non-profit committee was quickly organized to supervise the business affairs of the proposed clinic. Financial support for the project not only came from the Federal and State Government but also from community minded citizens, organizations and local government.

Over the ten year history of the Wall Clinic many things have changed. The most significant thing being that the Wall Clinic has grown from a government supported entity to a nearly self-supporting organization that is providing Rural Health to a community that cannot afford the full-time services of a doctor or hospital.

South Dakota's Physician Assistant Law was designed and written to allow Physician Assistants to provide medical care under the supervision of a physician in isolated rural communities. The Clinic now contracts privately with Dr. Robert Hayes as supervising physician and the nine person volunteer board of directors meets monthly to assist myself with the financial affairs of the Clinic.

Since our beginning in 1975 we have been able to provide primary medical care for about 15 patients per day. Our Clinic Board estimates that the Clinic has seen some 38,000 patients since 1975. The area in which the Clinic serves is a 6,000 square mile area. Many of these patients have to drive over rough gravel roads to get to our clinic. However, you never hear of any complaints because without the Clinic in Wall many of them would have to travel anywhere from 70-100 miles one-way to see a Health Care Provider.

Dr. Hayes and myself treat both the young and the elderly. But I believe the best service we provide is the care for the elderly. Here is an age group in which it becomes more and more difficult to travel long distances to see a doctor, especially, when they do not have any means of transportation to take them there. Not only do we provide care at the Clinic but will make house calls when they are unable to get to the Clinic. Last winter on a cold, snowy night I traveled to Quinn, five miles from Wall, to see an elderly man suffering from the flu. The daughter thanked me over and over for being here because it is tough living in no where. Last week I went into an elderly

lady's home to administer IV Chemo-Therapy because she wanted to be near her family and it was hard for her to travel to Rapid City for the therapy.

If any of our patients need to be hospitalized or see a physician we usually send them to Rapid City which is 52 miles west of us. We try to get the patient to the doctor of their choice. In many cases we will work with that doctor so the patient will not have to make the long drive back for re-checks. In case of emergencies our job is to get these patients comfortable and as stable as we can before we move them the 52 miles west by ground ambulance.

You see, you members of Congress did a good job for us in Rural America when you authorized the Rural Health Clinic Act and when you also authorized the Emergency Medical Service Act which helped us get our Ambulance Service modernized and into the 20th Century. We have an excellent voluntary ambulance service in Wall which helps our Clinic exist. Without an adequate Ambulance Service a Rural Health Clinic would not be able to evacuate patients satisfactorily. In Rural South Dakota we do have some problems with not enough ambulance volunteers. This does threaten the lost of these services in small towns.

These two bills which you passed in the seventies are paying off for us in the eighties.

Under the Rural Health Clinic Act we are a registered Rural Health Clinic and are able to give care to Medicare and Medicaid patients. We are regularly inspected by the State Department of Health for Medicare. This is done to be certain that we meet the minimum standards for delivery of Health care as a clinic. In addition to being monitored by the State Health Department, we also have our own internal review process in our own clinic. So we feel that we

give a good standard of medical care. We welcome examination and inspection of our clinic and our work because it gives us a chance to show off our quality of medical care. Yes, we do accept Medicare assignment.

We are also pleased that we have been able to hold the cost down. No matter what we do the cost of medical care is high enough but our costs are consistently less than the average. Our secret is, of course, not to order what we do not need. Our laboratory, EKG, and X-Ray are used only if needed.

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In summary, I want to thank the Congress and our Senator James Abdnor in particular, for support you have provided us with through the Rural Health Clinic Act and the Emergency Medical Services Legislation. These two pieces of Legislation have gone a long way in trying to give people in Rural America access to quality medical care at a reasonable cost. As a Physician Assistant I am proud to be part of that scheme of things. Our problems now are to try to keep up the quality of medical care we are able to give as the new medical technology continues to explode around us. We learn more and are able to do more each day but all of this translates into increased costs. We continue to try to hold the line and use the best of the older accepted treatments and carefully select the new and more expensive procedures. We will continue to work at the unglamorous job of primary care which is what we do in a

Rural Health Clinic. It is what we need out in our country and our people know it.

Last February when I testified in Freeman, SD, a group of farmers were there from my home town of Scotland, SD. That afternoon after I testified my father asked them what they got out of my speech. They all agreed that is a government project that worked. They are so right a Project that the Federal Government, State and Local organizations worked together to provide a bright spot in Rural Health.

I thank you collectively and each of you individually for your continued support.

Senator ABDNOR. Thank you, Dave. You do a fine job out there and I am sure the panel members get that feeling from your testimony here. You are following in the footsteps of a mighty outstanding rural health leader, Dr. Robert Hayes. We do hope he is making a splendid recovery.

I do not know how many areas of the country have rural areas as we do, but do you think the Wall Clinic is a success story that would serve as a model for other rural communities?

Mr. CUSTIS. Oh, certainly. There is in South Dakota, for example, White River, Murdo near your home; there is Buffalo, Faith, to name a few. In the eastern part of the State there is Elk Point, Bryant, Howard. They are spread throughout the State and each one of them is very useful in rural South Dakota, so people do not have to drive the long distance they would have to in South Dakota.

Senator ABDNOR. Thank you, Dave.

Just to show you what we mean by the "rural world," we have a lot of these little towns next to Wall, 50, 60 people. Even if we did come up with any new programs, it would be hard to design them for rural America.

Mr. Cordes, we are happy to have you here from the Department of Agricultural Economics at Pennsylvania State University.

We welcome you to the panel.

STATEMENT OF SAM M. CORDES, ASSOCIATE PROFESSOR OF AGRICULTURAL ECONOMICS, PENNSYLVANIA STATE UNIVERSITY

Mr. CORDES. Thank you, Mr. Chairman and guests.

I am sorry to say that I am one of those unfortunate statistics that you talked about at the opening. I am originally from western South Dakota, where my family still lives.

Senator ABDNOR. I did not know that.

Mr. CORDES. I know you did not know that. But, I was educated at South Dakota taxpayers' expense, including a one-room rural school from grades 1-8, then high school and college. Since, I have gone onto greener pastures elsewhere, first Washington State University and now Penn State University where I do applied

economic research on rural development issues, and rural health care services in particular.

I am just going to summarize my remarks—it may be a little rough—in the interest of time. I do have a prepared statement for the record.

Senator ABDNOR. It will be made a part of the record.

Mr. CORDES. I would like to touch on three or four main points. One is the relationship between rural health and rural development.

Second, the precarious position of the rural hospital and, third, the question of physician distribution.

On the issue of the relationship between rural health and rural development, the obvious reason that we want health care in rural areas is to take care of the people in need, such as my fellow panelists just described. But there are other reasons beyond that.

"Human capital" is an economic development term. It is a fancy term that simply says that investing in human beings is important. People are productive assets and you get an economic return from that kind of an investment. There is at least one study that suggests that the single greatest barrier to labor force participation in rural areas is health problems.

Second, communities will not be as successful in attracting new businesses and industries into their areas if they do not have an adequate service base.

Third, from a recent study we finished in an eight-county rural area of Pennsylvania, we found that the hospitals alone in that area had \$16 million in cash and short-term investments. More importantly, 90 percent of that \$16 million was held in local financial institutions.

Now, this represents a substantial pool of investment funds, whether they be for agriculture, for individuals, or for business and industries in those communities.

Fourth, and perhaps the most important, is the employment impacts of the health care sector in rural areas. In the same study, we constructed a hypothetical rural town of 7,700 people and estimated that a hospital in that community would employ 469 people. If you take into account the multiplier effect associated with the fact that the hospital spends locally and so on, you add on an additional 231 jobs. So, it is not at all unrealistic to argue that the hospital in many rural communities is the single largest employer, and may represent at least one-fourth of the local labor force.

But what is the position of the rural hospitals? Well, at the moment, in many cases they are in real tough shape. Recent evidence suggests that expenditures are exceeding revenues by about 7 percent for hospitals with less than 25 beds, and 82 percent of these hospitals are located in rural areas.

Senator ABDNOR. How many beds did you have with those 450 people?

Mr. CORDES. By South Dakota standards, that would be a large hospital. That would be a hospital of about 200 beds.

Senator ABDNOR. All right.

Mr. CORDES. One of the main reasons that hospitals are having a real struggle at the moment in rural areas is because the Medicare reimbursement system has been changed to a prospective payment

system. Now, Medicare is concerned about the spiraling costs of health care and as an economist, I have great appreciation for the need to hold down the Nation's health care spending.

But, I hope that in our zeal for cost containment, that we do not at the same time throw the baby out with the bath water. I have at least a couple of concerns.

One, I would suggest that the goals of access to basic care equity are at least as important as is the goal of cost containment. And, let's put this in perspective. The battle for health care cost containment is not going to be won or lost in places like Down East Community Hospital in Machias, ME, or in Clearwater Valley Hospital in Orofino, ID. That battle for cost containment will be won, or lost, in the Nation's giant hospitals, in the medical school complexes, and those who are going to have to make the tough decisions about the cost implications of artificial heart transplants and those kinds of things.

Second, whenever we implement a new program, I think we have to be careful that we do not accidentally introduce discriminatory kinds of practices. It is real clear, the evidence is mounting, that the Medicare reimbursement system has indefensible variations in terms of the payment rates received by rural hospitals.

Rapid City, SD, for example, is considering a special census at the moment to see if they have enough people to be reclassified as a metropolitan area. One of the primary reasons for this is that it will mean an additional \$1 million in Medicare revenue for Rapid City Regional Hospital.

Senator ABDNOR. That makes that much difference?

Mr. CORDES. Yes. For that hospital and that community it will make a \$1 million difference depending on whether they are reimbursed on the rural versus the urban rate. Currently, Rapid City is classified as nonmetropolitan according to the Census.

Senator ABDNOR. Is it a pretty good bet they are going to make it?

Mr. CORDES. Pretty close, they were 4,000 people short in 1980. They need 50,000 and they had 46,000.

Senator ABDNOR. Go ahead.

Mr. CORDES. Let me turn to the issue of physician distribution. Now, we all know that there has been a giant increase in the supply of physicians in the last 10 to 15 years. In fact, that has created a new "buzz word" in the rural health policy field, and that buzz word is "diffusion." The idea is that urban areas will become saturated with physicians and then physicians will "diffuse" into rural areas.

Well, if you look at all the nonmetropolitan or rural counties across the country, you find that between 1970 and 1980 there were an additional 13,899 physicians in rural counties.

Now, at first glance this suggests that diffusion is, in fact, working. But, if you look behind those statistics, you find that what is really going on is—to use a rural metaphor—that we are really feeding the chickens by first giving the oats to the horses.

Specifically, while there were 13,000 physicians being located or relocating in rural areas, there were 90,000 new doctors in urban areas. In other words, for every one doctor that located in a rural area, there were more than six that located in an urban area. This

happened despite the fact that the population growth was faster in rural areas, and also despite the fact that rural areas started the decade of the 1970's with a physician-to-population ratio that was less than one-half of that in urban areas.

So, in a relative sense, the disparity has widened. More importantly, this concept of physician diffusion has absolutely no impact on many rural areas. In fact, 37 percent of the Nation's rural counties have had absolutely no increase in their physician-population ratio between 1970 and 1980.

Those rural areas, at least, as defined by the Bureau of Census, that have benefited the most from physician diffusion, I think, are quite unusual kinds of areas.

Let me just share with you information on six or eight such counties. These happen to be the rural counties in their respective States that gained the most physicians between 1970 and 1980.

First, Pennington County, SD had 65 physicians in 1970 and gained an additional 42 during the 1970's. Virtually all of these doctors are located in Rapid City. Rapid City, as you know, Senator Abdnor, is a lovely place. It is South Dakota's second largest city located at the foothills of the Black Hills, near Mount Rushmore National Monument, and so on.

It is of interest to me at a personal level that my family's ranching operation finds Rapid City to be the closest physician these days, and that is a distance of 60 miles. Now, 40 years ago, before all these great benefits from diffusion, the nearest physician was 25 miles.

Santa Fe County, NM had 77 physicians in 1970 and gained an additional 82 during the 1970's. This county includes Santa Fe, the State capital, and New Mexico's second largest city. As the Nation's second oldest city, Santa Fe has a rich cultural heritage and has been described in glowing terms in various publications, including National Geographic.

Collier County, FL had 50 physicians in 1970 and gained an additional 101 physicians during the 1970's. It is on Florida's Gulf Coast, includes the town of Naples, a rather exclusive retirement community located 35 miles from the Fort Myers metropolitan area.

Mesa County, CO had 90 physicians in 1970 and gained an additional 72 between 1970 and 1980. Mesa County is located on the scenic western slope of the Rocky Mountains and contains the Powderhorn ski resort and Grand Junction, the major trading center for all of western Colorado.

San Luis Obispo County, CA had 155 physicians in 1970 and gained an additional 105 doctors during the 1970's. The county's population grew by 47 percent and by 1980 had a population in excess of 150,000. San Luis Obispo County is located on a well-known stretch of the Pacific Coast. It includes San Simeon and Morro Bay and the town of San Luis Obispo, home of California Polytechnic University.

Grafton County, NH had 209 physicians in 1970 and gained an additional 95. Grafton County includes much of the White Mountain National Forest, several ski areas, and the town of Hanover which is home of Dartmouth College and the State's only medical school.

Cole County, MO had 63 physicians in 1970 and gained an additional 43. Cole County includes Jefferson City, the State capital.

Finally, Beaufort County, SC gained an additional 61 physicians during the decade of the 1970's. It is located on the Atlantic Coast and includes Hilton Head Island resort area.

Now, I would submit to you that these counties are not the kinds of counties that we are concerned about when we talk about rural health care needs. These counties were relatively well endowed to begin with, and they bear virtually no resemblance to the kinds of counties that we are concerned about in terms of being remote, rural, and needy.

These data suggest to me that this concept of physician diffusion really has no part in rural health policy, or very little part, unless you want to assume that all rural communities can either attract or develop a major university, hopefully one with a medical school; a national park; the State capital; and maybe a coastal resort.

However, it appears that there are those who believe that this kind of thing will happen. Some of the programs like the National Health Service Corps and the Community Health Care Centers Act that provide needed services to areas that are not represented by the kinds of counties I just described are to be eliminated according to certain budget proposals coming out of this administration.

It is absolutely ludicrous, I think, to suggest that this idea of physician diffusion will render these kinds of programs obsolete.

Finally, within the context of the policy framework—whether it be rural health or rural development—I would hope that as the committee debates, and develops, and implements policy, that a couple of things will be taken into account.

One is recognition of the extreme diversity in rural areas. What works and what does not work, and what is needed, in a place like Willachoochee, GA, will not necessarily be what is needed and what works in Tonopah, NV.

Second, in the case of health care I think we are going to have to grapple with how we view health care. Is it something that is to be guaranteed, at least some minimal amount, regardless of place of residence? It seems to me that if we sit idly by and accept the demise of the National Health Service Corps, and the closure of rural hospitals, we are really saying that some people, by virtue of where they live, really should not be entitled to basic health services.

I happen to personally reject that idea. In some quarters I have even heard people argue that rural people ought not to complain; if they do not like the services that are there, they ought to relocate. This reminds me of the individual who was allegedly enraged and exasperated on December 7, 1941, and said, "Well, what in the hell was Pearl Harbor doing out there in the middle of the Pacific anyway?"

I know, Senator Abdnor, that you are more sensitive and sympathetic to rural concerns than that; and I hope that you can get others in the Congress, as well as in the administration, to be equally sympathetic and sensitive to the very real needs that do exist. Thank you.

[The prepared statement of Mr. Cordes follows.]

PREPARED STATEMENT OF SAM M. CORDES*

Rural Health and Rural Development

Good morning Mr. Chairman and members of the Committee, and thank you for this opportunity to discuss some of the health care issues facing rural America. It is commendable and long overdue that today's hearing is taking place, and I applaud your efforts. The views I share with you today represent a combination of personal and professional experiences. At the personal level my rural roots and experiences are genuine--I grew up on a cattle ranch in Western South Dakota, attended a nearby one-room school through the eighth grade, traveled over 70 miles (one-way) to attend high school, and after a year's college taught a one-room rural school. In terms of professional activities, much of the applied economic research I have undertaken during the past 15 years--at both Washington State University and The Pennsylvania State University--has focused on rural development, with particular emphasis on rural health care delivery. Later this year I will be assuming administrative responsibilities within the College of Agriculture at the University of Wyoming, and I am especially pleased that one of the College's priorities is the economic development and diversification of that very rural state.

I'm sure each of us has occasionally fantasized about how nice it would be to experience the "good life" in the country. In large part, our fantasies are just that; it is true, but unfortunate, that today's rural reality is inconsistent with the romantic, idyllic, and pastoral stuff from which our dreams and fantasies are made. For example, the incidence of poverty and sub-standard housing is greater in rural than in urban areas, and the rural population contains a disproportionate share of the "transportation disadvantaged".¹

The list of grim statistics is nearly endless, but I want to move beyond the facts and figures which shatter our fantasies about the "good

*Associate Professor of Agricultural Economics at The Pennsylvania State University, and immediate Past President of the American Rural Health Association. The views expressed are those of Dr. Cordes, and are not necessarily endorsed by either Penn State or the ARHA.

life." Specifically, I want to discuss four issues: the relationship between rural health and rural development; the precarious position of rural hospitals; the fallacy of physician diffusion; and two general issues affecting rural policy.

Rural Health and Rural Development

I am pleased that the Joint Economic Committee has the wisdom to recognize that rural health services have importance beyond their obvious and immediate role of providing care to those in need. Indeed, there are at least five additional roles or avenues of contribution. One avenue is through the formation of "human capital." Human capital is an economic development term that implies that human beings are productive assets, and that investments in human beings yield returns in the form of increased labor productivity. The contribution of health care to labor productivity can be immensely important within the broader rural development context. For example, a study of the South found that health problems are the greatest single barrier to labor force participation in rural areas².

A second role for health care has to do with the ability of rural communities to attract and retain job-inducing businesses and industries. There are at least two reasons why a community with adequate health care will surely be more attractive to potential employers than will a similar community with inadequate health care. First, the company may meet strong employee resistance if it tries to transfer certain employees (e.g., a management team) into a community with sub-standard services. Second, businesses and industries are becoming increasingly concerned, for a variety of reasons, about the local availability of specific types of health services. We recently sent a survey to the Chief Executive

Officers (CEO) of all hospitals in Pennsylvania, and in that survey we asked if the hospital provided seven specific services to community businesses. Approximately four out of the five hospitals provided at least one of these services³. The CEO was also asked about their hospital's involvement in efforts designed to attract business and industry into the community. Nearly one-half of the hospitals (44 percent) were somehow involved, and some of the responses were particularly enlightening. For example, one CEO noted that:

Representatives of the hospital's top management are key members of the local Chamber of Commerce. The Chamber's Committee on Economic Growth has identified health services as an important community resource. The hospital has structured preventive and diagnostic packaged services to industry.

Another CEO wrote that:

Areawide business organizations routinely use the availability of hospital services as a recruiting tool. Contacts with business organizations are routine.

The third factor I want to mention has to do with the cash and short-term investments held by hospitals, clinics, and other health-related institutions. Part of the study noted earlier involved an analysis of an 8-county nonmetropolitan area; and we found that the cash and short-term investments associated with the area's 16 hospitals totalled more than \$6 million. Moreover, 90 percent of these funds were held in local financial institutions. These holdings provide a substantial source of funds which

can be used for investment purposes by local businesses and individuals.

Another factor which links rural health and rural development has to do with the development of local leadership. Richard Couto has studied the process by which rural communities have improved their health services and notes that:

Under the right conditions a process may occur where the leaders of health fairs and clinics become (or often already are) recognized as "doers"; the community begins to think better about itself, providing a boost in mental health; specific skills, such as fund raising, are revived; and new skills that are acquired in clinic development, such as proposal writing and organizing to obtain money through revenue sharing, can be applied to additional problems like the need for improved water systems, roads, and housing⁴.

A final, and crucial, factor linking rural health to rural development has to do with the employment impacts associated with the health care sector. In our Pennsylvania study we constructed a hypothetical rural community with a population of 7,700. We determined that the typical hospital in such a community would employ 469 persons. However, a multiplier effect is simultaneously set in motion because (1) a considerable amount of the hospital's revenue is from patients who come from outside the immediate community, and (2) the hospital spends a substantial proportion of these revenues locally. We estimate that this multiplier effect generates an additional 213 local jobs in our hypothetical rural community. Hence, it is not unrealistic to argue that hospitals located in rural communities are frequently the community's

largest single employer, and the direct and indirect employment impacts could easily account for one-fourth of all of the community's jobs. These employment opportunities may be particularly important as a source of supplemental income for farm families who are trying to weather the current agricultural crisis.

Having shared with you my ideas on the extremely strong linkages which exist between rural health services and rural development, I would now like to discuss two health care issues of particular concern to me: the precarious position of rural hospitals and the fallacy of physician diffusion.

The Precarious Position of Rural Hospitals

Many rural hospitals are facing excruciating financial pressures. For example, recent figures show that expenses are exceeding revenues by seven percent among hospitals with fewer than 25 beds--82 percent of which are in rural areas⁵. Large lay-offs of staff are widespread, and wholesale hospital closures may be in the offing⁶. The financial crunch stems largely from Medicare's new Prospective Payment System (PPS) which began in October, 1983; and its associated Peer Review Organization (PRO) which began in August, 1984. The programs work in tandem to control the nation's health care expenditures: the PPS sets rigid limits on the reimbursement level for each hospital admission and the PRO program effectively reduces the number of hospital admissions.

As an economist, I am attracted to measures which attempt to stem the rapid growth in health care spending. However, in our zeal for cost-containment I hope we don't throw the baby out with the bath water! I have three particular concerns. First, in a developed and civilized

society we should have the sensitivity and wherewithal to be at least as concerned with the goals of equity and access as with the goal of cost containment. The appeal of this broader perspective is enhanced when one realizes it is not the savings which may be realized from the nation's small hospitals which make the real difference in the nation's health care bill. In other words, the battle for cost containment will not be won or lost in the corridors of Warren (Minnesota) Community Hospital, in the hallways of Down East Community Hospital in Machias, Maine, or by the physicians using Clearwater Valley Hospital in Orofino, Idaho. Instead, the cost containment battle will be won or lost in the nation's giant hospitals and medical school complexes, and by those who must struggle with the enormous cost implications of artificial heart transplants and other technological "marvels."

Second, we must be sure that our cost containment policies are not implemented in a haphazard fashion. For example, the new Medicare reimbursement system appears to have indefensible variations in the reimbursement rates between rural and urban areas--a variation which discriminates against rural hospitals; and the amount of dollars involved is not trivial. To illustrate, Rapid City, South Dakota is undertaking a population census in hopes of becoming designated as a metropolitan area. Probably the biggest motivator is that Rapid City Regional Hospital would gain an additional \$1 million in Medicare revenues if it can be reimbursed under an "urban" rather than a "rural" rate⁷. Indeed, a draft study by the Congressional Budget Office concludes that urban hospitals will receive more revenues under the new reimbursement system when compared to the prior system; but rural hospitals will receive less revenue than before.⁸

Third, as we change the rules of the reimbursement game we should consider regulatory reform in other areas. Many rural hospitals can adjust successfully to the financial squeeze if they are given more flexibility with respect to existing rules and regulations. For example, Medicare's "swing-bed" concept gives rural hospitals the flexibility to shift acute-care beds into long-term-care beds. Unfortunately, this allowance is available only to rural hospitals with fewer than 50 beds; and in the absence of a regulatory change the financial benefits of this concept will continue to be denied other rural hospitals. Even more ominous is proposed legislation which places the entire "swing-bed" program in jeopardy.

The Fallacy of Physician Diffusion

Less than two decades ago the nation was concerned with a physician shortage, and today the concern is that the nation may have a surplus of 70,000 physicians by 1990⁹. This situation has created a new buzz word in the rural health field. This buzz word is "diffusion"; and it simply means that the phenomenal recent and projected increase in physician supply should cause physicians to "diffuse" into rural areas. At first glance, it would appear that diffusion is working in that the nation's nonmetropolitan counties (those counties not containing, or not socially and economically integrated, with an urbanized center of 50,000 population) gained 13,899 physicians during the decade of the seventies.¹⁰ However, upon closer examination it becomes clear that diffusion is really analogous to "feeding the chickens by first giving the oats to the horses." Specifically, for every additional physician gained by the nation's nonmetro counties, more than six additional physicians were

gained by the nation's metropolitan counties. In absolute terms, metro counties gained 90,271 physicians compared to the gain of 13,899 by the nonmetro counties. This occurred despite the fact that the rate of population growth was approximately 70 percent faster in nonmetro counties than in metro counties (15.2 percent compared to 9.0 percent); and despite the fact that nonmetro counties began the decade with a physician-to-population ratio that was only 45 percent as large as the metro ratio (68 physicians per 100,000 population, compared to 153 physicians per 100,000 population). By the end of the decade this disparity had widened even more, and nearly 3,000 more physicians (in addition to the gain of 13,899) would have had to have located in nonmetro counties during the decade of the seventies to simply maintain the relative disparity (of 45 percent) which existed in 1970!

The second problem with the diffusion approach is that it has had absolutely no impact on many rural areas. Nationally, 37 percent of the nation's nonmetro counties did not experience an increase in their physician-to-population ratios during the seventies. In several states (Idaho, Iowa, Missouri, Nebraska, and Nevada) fully one-half of the counties did not register an increase in their physician-to-population ratio!

Finally, a close examination of those nonmetro counties which did gain significant additional physicians can best be described as a case of "the rich getting richer." Let me illustrate by describing the following counties which were the biggest nonmetro "gainers" in their respective states between 1970 and 1980:

*Pennington County, South Dakota had 65 physicians in 1970, and gained an additional 42 physicians during the seventies. This county includes a large portion of the scenic Black Hills, including Mount Rushmore National Monument. The county also includes Rapid City, South Dakota's second largest city (1980 pop. = 46,492). At a personal level, it is of interest to me that the nearest physician for my family's ranching operation is in Rapid City, a distance of 60 miles. However, 40 years ago--and before "diffusion"--the nearest doctor was only 25 miles, and 20 years ago the nearest doctor was but 35 miles distance.

*Story County, Iowa had 62 physicians in 1970, and gained an additional 31 physicians during the seventies. The county includes Ames, Iowa, a community with a 1980 population of 45,775 and home of Iowa State University.

*Sante Fe County, New Mexico had 77 physicians in 1970, and gained an additional 82 physicians during the seventies. The county includes Sante Fe, the state capital (1980 pop. = 48,953) and the state's second largest city. Sante Fe is located near the scenic Sangre de Cristo Mountains, and as the nation's second oldest city has a rich cultural heritage, and has been described in glowing terms in various publications, including National Geographic.¹¹ In more recent years it has become a mecca for artists and writers. The county's population grew by 40 percent between 1970 and 1980.

*Collier County, Florida had 50 physicians in 1970, and gained an additional 101 physicians during the seventies. The county is on Florida's gulf coast; and includes the town of Naples, a rather exclusive retirement community (1980 pop. = 17,581) located 35 miles from the Fort Myers metropolitan area. The county's population more than doubled during the decade of the seventies.

*Mesa County, Colorado had 90 physicians in 1970, and gained an additional 72 physicians between 1970 and 1980. The county's population grew by 50 percent during the seventies. Mesa County is located on the scenic Western Slope of the Rocky Mountains and contains the Powderhorn Ski Resort. Grand Junction (1980 pop. = 28,144), the major trading center for Western Colorado, is also located in Mesa County.

*San Luis Obispo County, California had 155 physicians in 1970 and gained an additional 105 physicians between 1970 and 1980. The county's population grew by 47 percent during the seventies, and by 1980 had a population in excess of 150,000. San Luis Obispo County is located on a well-known stretch of the Pacific Coast that includes San Simeon and Morro Bay. The town of San Luis Obispo (1980 pop. = 34,252), home of California Polytechnic State University, is also located within the county.

*Wood County, Wisconsin had 111 physicians in 1970 and gained an additional 100 physicians between 1970 and 1980. Wood County is home of the Marshfield Clinic, a very sophisticated medical

complex.

*Montour County, Pennsylvania had 140 physicians in 1970 and gained an additional 110 physicians between 1970 and 1980. Montour County is home of the Geisinger Clinic, a nationally renowned medical complex. Interestingly, Montour County has the highest physician-to-population ratio of any county in the nation--metro or nonmetro.

*Monogalia County, West Virginia had 190 physicians in 1970 and gained an additional 160 physicians between 1970 and 1980. Monogalia County includes Morgantown (1980 pop. = 27,505), home of West Virginia University and one of the state's two medical schools.

*Grafton County, New Hampshire had 209 physicians in 1970 and gained an additional 95 physicians between 1970 and 1980. Grafton County includes much of the White Mountain National Forest, several ski areas, and the town of Hanover. Hanover is home of Dartmouth College, and the state's only medical school.

*Cole County, Missouri had 63 physicians in 1970 and gained an additional 43 physicians between 1970 and 1980. Cole County includes Jefferson City (1980 pop. = 33,619), the state capital.

*Beaufort County, South Carolina had 24 physicians in 1970 and gained an additional 61 physicians during the decade of the seventies.

Beaufort County is on the Atlantic Coast and includes the famous Hilton Head Island resort area.

I submit to you that the nonmetro counties just described are hardly representative of the nation's rural areas. In fact, one is struck by the fact that these counties bear virtually no resemblance to any common conception of rurality. These data suggest to me that "diffusion" may have a very limited role to play in an effective and cost-efficient rural health policy-- unless, of course, we assume that all rural communities can either attract or develop a major university (preferably one with a medical school), the state capital, a national park, or a coastal resort! Unfortunately, the current Administration appears to be making such an assumption in that their proposed budget would totally eliminate National Health Service Corps (NHSC) scholarships. The NHSC has been in place for over a decade and has involved the placement of hundreds of physicians in "underserved areas." In exchange for agreeing to serve in these areas, the Federal government pays for the physician's medical education. About one-half of these scholarship recipients also receive government salary support while his or her practice obligation is being fulfilled. Another program which has been particularly helpful to rural areas is the Community Health Centers program (Section 330 of the Public Health Service Act). This program has led to the establishment of hundreds of primary health care clinics in underserved rural and inner-city areas.

It is absolutely ludicrous to suggest that these programs will be rendered obsolete because of physician diffusion. Diffusion can never be expected to solve the problems of many rural areas. However, it could be expected to be somewhat more effective if we had an adequate supply of the

right type of physicians. The right type is, of course, primary care physicians--and, in particular, general and family practitioners. No other type of physician requires as small a population base as does the general and family practitioner. However, during the decade of the seventies the supply of general and family practitioners did not increase, despite a 40 percent increase in the total physician supply. The Federal government--largely through Medicare--picks up a large portion of the cost of graduate medical education incurred by the nation's teaching hospitals. Senator Quayle is proposing legislation that would make this Federal subsidy conditional upon the type of physician specialties produced by the nation's teaching hospitals.¹² I support this general approach and hope Senator Quayle's legislation will include provisions for rewarding those teaching hospitals that increase the supply of general and family practitioners.

A larger supply of general and family practitioners, with particular emphasis given to recruiting medical students from rural areas, would be a positive development. Again, however, it is naive to think that these physicians would automatically "diffuse" into the most rural, remote, and needy areas--especially if there is a wholesale closure of rural hospitals. If all areas are to receive some minimal set of physician services, the same way that all areas receive some semblance of postal and judicial services, some form of subsidy will be required in certain rural areas.

The Policy Framework

I would like to close by making two general comments which I hope will be taken into account as rural health and rural development policy are considered by this Committee. First, I would like to point out that

one of the most salient characteristics of rural America is its diversity. As rural health policy is debated, enacted, and implemented this diversity must be recognized. What is needed and what works in Willachoochee, Georgia may not be what is needed and works in Tonopah, Nevada.

Second, we must grapple with the larger issue of how we, as a civilized society, view health care. If we sit by idly as rural hospitals close and as President Reagan calls for the elimination of the National Health Service Corps, we are really saying that government does not have an obligation to ensure that all citizens--regardless of their place of residence--should have some minimal level of health services available to them. I reject that notion, and am appalled when I hear the argument that the rural citizen should relocate, rather than complain, if he or she doesn't like the level of services available. This line of argument is, of course, indetical to that of the exasperated individual who allegedly raged on Dec. 7, 1941 "What in the hell was Pearl Harbor doing out in the middle of the Pacific?" I trust that the members of this Committee will have a more sympathetic and sensitive perspective for those 60 million citizens who call rural America "home."

Thank you.

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Senator ABDNOR. Thank you. I think you ended this on a note that maybe I would like to explore just a little bit.

First, let me say to all of you how valuable your testimony is. When we first started this process, I held a couple of field hearings out in South Dakota, and these are some of the things I wanted to get into. But the agricultural problems are so emotional out there that at each meeting I could not get off the agriculture subject, as you know, Dave, when we were out at Freeman we had a huge crowd.

I have been holding hearings on agriculture for 1½ years in the Joint Economic Committee and we turned over a great amount of testimony to the Agriculture Committees.

We are really glad and pleased to get into these areas because they are all part of rural America.

You were saying you think the Government does have a responsibility—apparently somebody does. I cannot figure out who it would be but Government to guarantee some kind of rural services, services to rural America, to the rural residents.

How far would you go with that? We talked about education, we talked about health and other things. That could get to be a very expensive thing if you come along and want to make rural America a paradise.

Mr. CORDES. Again, it seems to me that there are certain rural areas that simply cannot support locally some minimum level of health care services. If that is the case, then we either accept that or we say, "No, that is not the way we want it to be."

Now, exactly where you draw the line, I do not know. I think we are talking about some fairly basic, minimal kinds of services. I do not think most rural areas want or need a Mayo Clinic.

We have been successful in defining some minimal set of standards in the case of postal services. I mean, all rural areas, all rural people, have postal services, at least at some level, available to them; judicial services as well, and so on.

So, I think it is a judgment call, but I think those judgments have been made and can be made.

Senator ABDNOR. Mr. Farmer, your service is a little different than the others. How far is it feasible to expect people to come to receive your service?

Mr. FARMER. I think that any time people travel over 30 miles for mental health services, there is a dramatic falloff in the follow-up rate from visits during a crisis situation to the followup care that they need.

I think that services have to be extended out into the rural areas to have the continuity that they need to be satisfactory.

Senator ABDNOR. What is the answer, the doctor moves to the town?

Mr. FARMER. Well, I think one of the things that the Mental Health Service people do is, sometimes we do locate mental health professionals out in rural communities and serve the rural population in a similar manner to the Wall Clinic, or they come in and work out of a physician's office and provide services on a one-day-a-week circuit rider approach out of a metropolitan area, so that the services are extended out to the rural communities.

I think that there are pluses and minuses to both situations. If a mental health professional is in a small rural community, over a period of time his personal credibility will be eroded because he is so much a part of the social fabric of the community and the professional coming in from an urban area on a regular basis may continue to have impact in that community.

I think that for many types of emergencies, types of services, I think the visiting professional is not adequate to provide the services that the rural community needs to handle the crisis situations that develop.

Senator ABDNOR. Mr. Coward.

Mr. COWARD. I would like to just respond for a second and use the Wall Clinic as an example. I think that if we look towards innovative ways of delivering these services, we may have a better chance of reaching both the goal that Sam spells out for us, but within the context of the real economic difficulties we are in.

I think it gets back to a thing that Ms. Dunne said earlier, however, which is, those of us who are interested in preparing these kinds of new models, as you called them, find it very difficult to attract the resources that we need and therefore, when we only think, "This is the way it is in urban America, how do we get that out to rural America," I think we narrow our options rather than expanding them if we had the resources to explore alternatives.

Senator ABDNOR. Mr. Christenson, can we hear your thoughts on this?

Mr. CHRISTENSON. I realize that the resources at the Federal level are limited and we are straining in that context. But the problems in rural America are different than the problems in urban America, and we just cannot be residually effective in urban America.

What we need is some real concerted watchdog effort to make sure that the legislation that is intended and the funds that are intended to go to rural America—whether they are in education or health—be used to the maximum and particularly that they do not go to resort areas or urban fringe areas, that they get out into the areas to benefit the rural people. That the physicians do not locate in a resort area so we are traveling 100 miles, but that if the programs are mandated to get education, health, family service, and other kinds of service to rural areas, that they go there and just do not go to the urban fringe.

Senator ABDNOR. We have an example of that. We apparently have had programs in the past where we have helped students get through medical school and then they are supposed to serve a certain length of time out in different places the Government may put them.

Many of them are located on our reservations. We could certainly use better hospitals for those people, but we cannot keep a new doctor there. That is where they are needed. They are needed out in our reservations, we have a lot of people living there. They need health care about as much as anything else.

How are we going to keep these doctors on the reservations? When they make a contract with the Government, they agreed to go to these places. They get out there and stay about 1 year. The

turnover is pretty heavy, is it not, Dave? As a matter of fact, the reservations are usually without a doctor.

Yes, Mr. Wright.

Mr. WRIGHT. May I comment on that?

Senator ABDNOR. Yes.

Mr. WRIGHT. I heard a story the other day about someone from Newark, NJ that was assigned a position through the National Health Service Corps in some small county in lower Georgia. They will not make it, I can tell you right now. I mean, it is a shock for me and I came out of a moderately sized town to live in south Georgia. But it is a great place.

The problem is, I think, that our educational institutions—and I think it goes back to there—are urban oriented. Look at the medical schools, they are based in tertiary centers, large hospitals, mostly in metropolitan areas. The students that come out of these programs by and large look at the urban setting as a place to go. I mean they believe that is where the quality is.

I think we need to re-orient, and I would recommend that we look at that strongly, re-orient some of those programs. Nursing school is the same way. In fact, do that in all of our health professional schools.

That is the only way that I can see that we can do it without the Government continuing to provide the service. I think we are always going to have to have Government health care provided in certain areas, but I think we could reduce that a great deal if we had some of these what I call rural targeted programs. They recruit rural students, have something in the curriculum about the rural setting and about the practice of health care in a rural area, which is different from urban health care, and try to expedite the students' employment or practice, setting up practice in a rural area.

Senator ABDNOR. That is an interesting thought. I keep referring to South Dakota, because I know that best, and it is pretty rural. We are having a very difficult time attracting doctors and dentists in locations in South Dakota, in some of our small cities, even.

We finally put in a 4-year medical school at the university. We were helping supplement tuition costs and making arrangements with other schools, but many times these young people go off to the other States to get that degree, they may marry a lady, or a lady marries her husband who is not accustomed to our State, and that presents a problem. I have seen them come back and it still did not work out.

There is a lot of difficulty in trying to do this. We are not going to solve it here in this meeting, I am sure. Let us talk about education.

Mr. FARMER. One more comment?

Senator ABDNOR. Sure.

Mr. FARMER. On the alcohol, drug, and mental health grant, the funding was consolidated into a block grant funding to States, and it was based more or less on the existing mental health services that had developed over the years through the Community Mental Health Center Act.

The basic formula for rewarding the States was left intact when this block grant funding was put in place. Now, I understand, there

is a movement in the Appropriations Committee to go to a per capita basis and shift the mental health moneys to the larger States, the urban States, on the basis of population.

We believe in South Dakota that the exiting services are there for a reason and that the formula for funding the States should not be changed at this point. It would be a disservice to rural States to alter that formula.

Senator ABDNOR. Thank you.

Education, is it similar to the mental health problem, or is it an easier problem to deal with?

Ms. DUNNE. It is certainly not easier. I am fascinated to hear the similarities in the kinds of themes that are coming out of the people here who do relatively different kinds of service delivery within communities.

In education, enormous sums of money are spent and they tend to be deployed to the people who will make the most concerted noise in Washington or in the State capitals in order to get them.

One of the things about rural people is that they will not make concerted noise unless they are pushed absolutely to the wall, as they have been by the agricultural crisis recently.

But the notion is, communities will remain independent, they will stand on their own educationally, they will not go and make demands; particularly, they will not go and make demands for Federal dollars and therefore there is no group to speak for rural educational needs as there are groups to speak for the needs of the handicapped, as there are groups who will speak for the needs of the gifted, for that matter.

You do not, therefore, get the kind of reinvestment in rural communities that rural communities need. Now, I do not think the answer is programs which are intended to redeploy metropolitan teachers to rural areas, that will work only in very limited places. It will work in Stowe, VT; it will not work in Alligator, MS.

I think this is the point where you need to have other kinds of programs, the new model has to come into play. Let me give a very concrete example of how that might work.

Efforts through the Teacher Corps, et cetera, to get people from the always urbanized educational institutions out into the genuinely rural districts have failed—I am a little embarrassed, Grafton County having had its cover blown for the essentially northern suburb that it is.

But you can get people to Grafton County and get people to the areas around Hanover. You cannot get them up north to the northern tier of New Hampshire counties which are losing math and science teachers left and right.

Now, if you say, OK, we will keep sending them out from the University of Massachusetts, they are going to remain 1 year, 2 years, and then they are going to come back down. What you need to do instead is to get to the people who are living in Colbrook, to take the people who are there, and run a school-based teacher preparation program. You certify those people who are already committed to remaining in their communities, who have a stake in the community itself. You make teachers out of them rather than running a continual sort of merry-go-round, import-export business with people from urban settings who would prefer urban settings

and who tend not to be either readily accepted by the communities nor readily to accept them.

Senator ABDNOR. Pretty good.

You were talking about people, some groups have representation here and are represented in Washington and do nothing but watch the program. We see that all the time, and I can assure you, the rural States are always into that one. I know a number of people who represent various big cities in some of the States here. As a matter of fact, I think very highly of the gentleman that was here looking after Penn State, he is really a fine guy.

But where you really need them, in those rural areas, again you have a hard time—well, I had better be careful of what I say, we are supposed to be representing them as their Senators and Members of the House, wherever we come from.

But I know it does make a difference, I know that certain things happen in a committee. I get calls from back home about it sometimes before I knew about it myself because immediately that person here in Washington, or people who are listening to everything happening in a committee, immediately put out what is happening on the hot wire.

But these are things we have to try to react to, I guess. You are not going to change the system, we are just going to have to do a better job of concentrating on rural America.

Doctor, do you have some comments?

Mr. DELARGY. Well, I guess there is some good news out in rural America. If you looked back 6 or 7 years ago, you would have found one Center for Rural Education, now there are about seven or eight, and there are many States that are looking at the problem.

Rural people are finally saying, you know, "We have had enough." In Tennessee, recently, I was before a bunch of educators and they said, "They are no longer going to take our schools away from us, schools and Post Offices and other things are important, and we are going to keep them."

So, there is an awareness, an awakening, that is taking place and I think it is really neat. I think also that the schools are starting to take an active interest and an involvement in the rural economic development. In other words, they are taking a very pragmatic approach to, how can we link education with rural development; how can we do, for example, the things that Faith just mentioned in terms of making our rural people aware of the potential and giving them opportunities to stay within their rural community for health services, for education, for transportation?

The other thing is that if we look at two of the major resources in any community, especially in rural areas, they are youths or students and the elderly. We have a high percentage of elderly, and we can use them to our advantages by using the school as a focus point for bringing them in.

Recently, in Georgia, we took all the senior class out of a high school. We taught them how to read a map—many of them could not read a map—and we went out and interviewed 1,800 of the 2,200 elderly folks in that large rural community. We found out what their needs were, and we got the school involved in dealing with those needs in terms of health and that sort of thing.

We went back to the agency, planning agency, and overwhelmed them with the amount of information, the data we had. The consequence is—and it goes back to kind of blowing your own horn—we had so much data that we were able to get a \$50,000 grant. We have had one for 5 years. We have elderly in each one of the schools coordinating a volunteer program.

So, we are doing many things. We are using that resource and that energy. In addition to that, we are also helping those folks feel better about their community and their school. So, I think there is some promise out there if we can in fact use the educational process to make people aware of all the possibilities.

The other thing, even though I noticed recently that Pittsburgh was voted the No. 1 city, I have not heard too many people talking about retiring and going to Pittsburgh. So, there is real hope out there for us. I think most people want to go if they could have those health services and feel comfortable about an equal education.

One other comment I would make. Just 2 weeks ago, I was on a committee to evaluate a school in suburban Atlanta, an unbelievably good school. The next day, I got in the car and went to Fort Gaines, southwest Georgia, and I actually had tears in my eyes—and I am not usually that emotional—to see the inequality within our own State of what kids are getting in one place and not another when the State in fact has a State responsibility for offering equal opportunity for our kids in education.

So, there are those discrepancies that we really need to be aware of, and I think the Federal Government has a role in at least focusing on that inequality and trying to help us bring about some quality of education for rural kids not only in Georgia but all over America.

MS. DUNNE. In rural education we are not looking for paradise. We are looking for parity.

Senator ABDNOR. Do you have any comments to that?

Mr. COCKLE. Well, I guess I would like to go back to skill training just a little bit. Probably all of us in this room have had 4 years or more of college. We are probably among the 25 to 30 percent of people in the United States who do have.

To me, that is probably our most neglected area of training in the United States. Less than 50 percent of our people that are working today in other than professions have had any particular skill training. I think that is what is showing up in many of our problems that we have in the United States today.

The possibilities are there; the moneys are pretty much there. The question is, nobody really looks at it as an important question. Industry, all of a sudden, has learned that you have to have skilled people to compete. You cannot take people off the street and put them to screwing on the left front wheel of an automobile and giving them a job 8 hours a day, a robot can do that.

But we have to have people that are trained to work the robots, or trained to build them, to manufacture them, and to operate them. I guess that is the area I feel is one of the most important in our whole education system and certainly the most neglected.

I do not really know what to do about it completely. I know the technology is there to do something about it. The facilities are in place, but I think the will had to be there to make it work.

Senator ABDNOR. You are absolutely right.

You were just saying a few seconds ago, working with education and business, all of it working together as an alliance, it has a lot of merit to it and I hope that more of that can be done. In the rural areas of America you have to use every asset, every advantage you have. So, those are the kinds of programs we have to talk about.

One last question.

In agriculture we have programs to help distressed farmers and when the young people get into the business, the Farmers Home Administration, the FmHA, they offer lower interest than they pay back.

Do you think that something like that could ever be set up in health? Not in education, probably. Do you think there is any possibility of that, a loan program?

Mr. CORDES. Well, we have of course the one example, the National Health Service Corps where the Federal Government pays for medical education for those 4 years or however many years, and then in return the person—

Senator ABDNOR. It has not always worked either.

Mr. CORDES. Well, the problem of turnover that you mentioned does in fact occur; but I think that is one of the things that rural communities are prepared to live with. I think they are prepared to live with turnover rather than not having any physicians—at least in those communities that will not have any otherwise.

There have been some States that have experimented with low interest loan rates to people who go to medical school in exchange for practicing in a rural area. The Farmers Home Administration has helped support the building of rural clinics. The programs that have taken the low-interest loan approach in certain States have only had moderate success. Usually, the amount of the stipend is relatively low, and they just pay it back, plus whatever penalty may be involved. It makes more sense to take that money up front, use it to go to medical school, and even pay the penalty than to practice in certain areas.

Now, if you had a program that had a higher penalty clause in it, I think it would probably make a difference.

Senator ABDNOR. Yes, Ms. Dunne.

Ms. DUNNE. There is a way that that would work in education. It is a similar model to the National Health Service. There exists a very small program now to encourage teachers to go into rural areas, into poor rural areas, on a loan forgiveness basis.

I think that in medicine it makes sense to pay back the loan and pay the penalty unless the penalty were very high indeed.

In education, while the differences are quite significant between what you earn in a metropolitan district and what you earn in a rural district, a good size forgivable loan program in an area where virtually nothing like that exists at the moment could draw a lot of good people into rural areas for at least 5 years.

Now, there are places where that is going to be necessary in the short run at least to keep the shortage of teachers from becoming

an absolute crisis. I mean, there simply are not going to be math and science teachers with any vestige of math and science training in a lot of rural areas within 5 years. A good sized forgivable loan program might turn that around in the short run.

I think in the long run, you had better take indigenous people and make them teachers. But in the short run, a good sized forgiveness loan program could make a lot of difference.

It also could make a lot of difference to kids who would like to go and teach in their home communities but simply cannot afford to because they have debts to repay from their college education and therefore are more or less forced into the higher paying metropolitan school districts.

Senator ABDNOR. Well, with that, I am going to bring this to a close. I am sorry we cannot proceed with this meeting longer.

Today, we had another stimulating discussion on these issues of importance to rural America. We have taken a good, hard look at the very foundation of our rural towns—the social services structure. And we know how important they are to the economic well-being of rural residents as well. I wish to thank our many witnesses who have traveled so far to be here and have made such a great contribution to our committee's work on rural issues.

We have a message to send to Congress, collectively and individually, and it is going to be a challenge to get Congress to listen. We rural advocates are outnumbered at least 3 to 1 in terms of population and representation, and that is assuming we have the support of our nonmetro allies.

To date we have held four rural hearings in this series plus I have held four rural task force meetings in South Dakota. Already I see a common thread joining the diverse topics and ideas of these meetings. Rural people know that they make a major contribution to the U.S. economy and that they only ask for their fair share and a fair shake in return.

Rural people believe it is a matter of American principle that rural citizens are entitled to the same minimum, basic services that are available to their urban neighbors. They know that in return for those services that rural America makes a more productive contribution to the United States. Certainly our rural electric and telephone programs are evidence of our ability to harness new technology. It only needs to be available.

Well, you can count on my voice being heard loud and clear, defending what I consider to be the inalienable rights of my fellow rural citizens. These hearings are a big part of how we get the message to Congress. It is my hope and intention that this rural agenda will produce concrete policy recommendations for consideration of the Congress and the public. America has everything to gain by investing in its heartland.

Thank you again, one and all for participating in this hearing. We stand adjourned.

[Whereupon, at 12:35 p.m., the subcommittee adjourned, subject to the call of the Chair.]

THE RURAL LABOR FORCE

THURSDAY, JUNE 13, 1985

CONGRESS OF THE UNITED STATES,
SUBCOMMITTEE ON AGRICULTURE AND TRANSPORTATION
OF THE JOINT ECONOMIC COMMITTEE,
Washington, DC.

The committee met, pursuant to notice, at 9:35 a.m., in room SD-342, Dirksen Senate Office Building, Hon. James Abdnor (chairman of the subcommittee) presiding.

Present: Senators Abdnor, Mattingly, and D'Amato.

Also present: Dale Jahr, professional staff member.

OPENING STATEMENT OF SENATOR ABDNOR, CHAIRMAN

Senator ABDNOR. The Subcommittee on Agriculture and Transportation of the Joint Economic Committee will come to order.

Welcome to this fourth in a series of hearings of the Joint Economic Committee focusing on the rural economy. We welcome all of you to the hearing today.

Today we are going to examine the characteristics, the qualities, and the problems of the rural labor force. I am sure my interest in this subject is no surprise to one of our witnesses, Janet Norwood. We have discussed these matters at monthly employment hearings in the past.

I cannot overemphasize the importance of our meeting this morning. To me the rural labor force easily could be called the forgotten labor force because the Federal Government does not collect systematic and periodic data on the rural nonagricultural labor force. This is of great concern to me especially because the rural economy is not prospering from the current U.S. economic expansion which is in its third year.

The agenda this morning may be somewhat ambitious, to say the least. We have four very prestigious and expert witnesses to share their views. Among the topics outlined for the morning are a profile of the rural labor force and a comparison to its urban counterpart, rural unemployment data collection and reporting, potential biases and Federal funding allocation formulas when unemployment is a factor, underemployment, employment problems unique to our self-employed individuals, sole proprietorships and family small businesses, and rural cost of living and inflation statistics.

Indeed, these topics are important issues facing rural America and we are anxious to hear from all of you. First, I want to call upon Senator Mattingly, who is an important member of this subcommittee.

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Senator MATTINGLY. Thank you, Mr. Chairman.

I want to commend you for calling this series of hearings because I think it is vital that we understand and obtain the knowledge that is necessary for us to legislate.

I would also like to welcome Ms. Norwood once again to our hearing. It seems that no matter where we go Ms. Norwood is there giving out statistics, and I am not certain whether we can all consume them. Generally speaking I believe in the last couple of years they have been welcome statistics and they are getting better and things are getting better in our country.

So just keep bringing the good figures and maybe that will relate to the job that we are doing here in the Congress. Thank you, Mr. Chairman.

Senator ABDNOR. Thank you.

Again, Ms. Norwood, we welcome you to this subcommittee. We know of no one who has more expertise on labor figures. If my memory is correct, some time back you admitted yourself that it was a bit difficult to try to predict what is going on in rural America from the statistics that you collect.

In light of this, we are happy to have you here today and are anxious to hear from you.

**STATEMENT OF HON. JANET L. NORWOOD, COMMISSIONER,
BUREAU OF LABOR STATISTICS, DEPARTMENT OF LABOR**

Ms. NORWOOD. Thank you very much, Mr. Chairman and Senator Mattingly. I am really very pleased to have an opportunity to look at some of the issues relating to our data system for rural Americans. We at the Bureau of Labor Statistics in the Department of Labor have a great deal of interest in this field, although, of course, primary responsibility within the Government for issues relating to rural America is in the Department of Agriculture, and I am very pleased to see that the subcommittee will hear this morning from some of my colleagues at Agriculture.

We all recognize that we do not have all of the data we would like to have about rural Americans, especially when policy decisions need to be made that affect local areas of the country. Conditions of rural life differ in important respects from those in urban areas, and at times the concepts and definitions used in our national surveys may not be fully appropriate for the rural economy. This is especially true in the labor market, where world job opportunities are affected by weather, where part-time work can be an important factor, and where wages are often comparatively low.

It is also true in the price measurement area, since families living in rural areas may have different needs and spending patterns than those living in urban areas, and major purchases are often made on shopping excursions to adjacent urban areas.

In addition, of course, survey estimates are difficult to produce for small groups of the population wherever they are. Local area data are very expensive to collect and are often subject to considerable sampling and nonsampling errors. This set of circumstances reduces our ability to identify with confidence some of the issues that may need our attention.

While all that I have said about data difficulties is true, we should not overlook the fact that a considerable amount of data in the Nation's rural economy does exist. And I am pleased to be able to tell you, Mr. Chairman, that more is on its way from the Bureau of Labor Statistics monthly labor force survey and from our consumer expenditure survey. Some of the news on data availability is therefore quite good.

EMPLOYMENT AND UNEMPLOYMENT

The work that is currently underway in connection with the redesign of the current population survey will permit the regular publication of new data beginning next year on the labor force status of rural Americans. We will be able to separate those data from those relating to urban Americans and to analyze the differences between them. For this purpose, rural areas have been defined as those with a population density of less than 1,000 persons per square mile, or for towns, those with a population of less than 2,500. These data will be quite different from the data we have published in the past for nonmetropolitan areas which include large urban components.

I would like to share with the subcommittee some data that we have just developed covering the first quarter of 1985 that are currently in preliminary form. These data show that the population of persons of labor force age, that is 16 years and over, living in rural areas totaled 52.2 million. This was 29 percent of the total population of labor force age in the country of 177.5 million. The overall unemployment rate in rural areas was 8.0 percent, compared to a rate of 7.7 percent in urban areas—before seasonal adjustment.

A more important difference between rural and urban areas can be found in the proportion of the population that was employed, the employment-population ratio. The rural employment-population ratio of 58.4 percent was a full percentage point lower than the urban ratio. All of this difference was accounted for by rural adult women, whose employment-population ratio was nearly 2 percentage points below the national average. It should be noted that young people in the 16- to 24-year-age group had much higher employment-population ratios than those for the country as a whole. The ratio for rural adult men was about the same as for the United States overall.

The age distribution for rural areas is not much different from that for the Nation as a whole, although there are somewhat fewer young people. Whites are much likely to dwell in rural areas, with 31 percent of the population of labor force age living there. This contrasts markedly with the 15 percent for blacks and the 10 percent for Hispanics who live in rural areas.

A look at unemployment rates shows that rural blacks have lower unemployment rates than urban blacks do. This differs from the situation for whites, where the rural rate is higher than the urban rate, and for Hispanics as well.

But conditions in rural areas suggest that the unemployment rate may not be a very good measure of the labor market status of those who live in rural America. The figures cited above suggest that, in general, the incidence of unemployment in rural areas as

not materially different from what it was in urban areas. But we know that work in rural areas is often seasonal and that many of those living in these areas may have sustained periods of time without work. They are not counted among the unemployed if they are not actually seeking work.

This is often the case, for example, in the winter months when all residents of the area realize that no jobs are available. This kind of underutilization, which is so pervasive in our rural economies, is difficult to define and even more difficult to survey because the data secured would be more subjective than those which are based on our official definition, which requires search activity.

Another tough concept to measure adequately is invisible underemployment, in which the work people do is inadequate because it does not make full use of their skills or inadequately remunerates them. This is sometimes more of a problem in rural areas than in urban areas.

Rural areas accounted for 28 percent of total nonagricultural employment in the first quarter of 1985, about the same as their proportion of the population. Agriculture itself accounts for only about 7 percent of the employment total in rural areas.

LOCAL AREA UNEMPLOYMENT ESTIMATES

I am sure that the subcommittee is also interested in the data produced for States and local areas, many of which, of course, are rural. The Bureau of Labor Statistics compiles and publishes monthly labor force unemployment estimates produced by cooperating State employment security agencies for all States and approximately 4,600 sub-State areas. These areas include all metropolitan areas, counties, and those cities which have a population of 50,000 or more. Many of these small sub-State areas are primarily rural in character.

Although the Bureau of Labor Statistics has made a number of important improvements in the methods for calculating local area unemployment statistics, the starting point of the estimate is still a count of residents claiming unemployment insurance benefits under State law. Other data elements enter into the calculation of the estimates, but the UI data, which are affected by the same problems of rural underemployment that I have just mentioned, are an important block in building the estimates.

Many of the areas for which data are needed are quite small and are therefore subject to large relative error. Mr. Chairman, I do want you to know that I do understand the need for local area data, but I am also very concerned about the policy determinations that are often made as if there were no errors associated with small area estimates. It is unfortunate, but true, that the smaller the area, the more difficult the problem becomes. Even in the most sophisticated surveys, estimates for small areas are extremely expensive to produce with accuracy.

CONSUMER EXPENDITURES

Now labor market data for the rural population as a whole can be quite useful in determining the well-being of those who live in the rural parts of our country. In addition to data from our month-

ly labor force survey, the Bureau of Labor Statistics also has data on the rural population from our consumer expenditure survey for the year 1980. The purpose of this survey, which now includes rural areas on a continuing basis, is to obtain an account of consumer spending by different types of households. A representative sample of about 5,000 households were interviewed, of which about 18 percent were in rural areas outside of standard metropolitan statistical areas.

The differences in the socioeconomic characteristics between the average rural and average urban household contribute to the differences in expenditure patterns. The average rural household has lower family income, larger family size, an older householder, more vehicles per household and is more likely to own its own home than its urban counterpart. Other factors, such as costs of housing, availability of public transportation and other services and the availability of homegrown food, would also influence the pattern of consumption.

The data for 1980 show that the rural consumer units, in line with their lower income, have lower levels of spending than do urban consumers. The distribution of expenditures among budget categories is similar for the two groups, with two major exceptions. Urban consumers spend a higher proportion of their budgets on housing, 33 percent, compared with 28 percent for rural consumers. On the other hand, rural consumers spend a larger proportion on transportation than do urban households. The other major component of spending, food, takes only a slightly larger share for rural households, probably because family size is much larger, but rural households tend to spend a smaller proportion of their food expenditures on food away from home.

In 1981, the rural portion of the consumer expenditure survey sample was dropped because of budget reductions in fiscal year 1982. I am very pleased to tell you, Mr. Chairman, that the rural component of the sample was reinstated in 1984 and that data will be available on rural area consumer expenditures from that time forward on an ongoing basis.

I will glad to try to answer any questions you may have.

[The prepared statement of Ms. Norwood follows:]

PREPARED STATEMENT OF HON. JANET L. NORWOOD

Mr. Chairman and Members of the Committee:

I am very pleased to have an opportunity to discuss issues relating to the data system for the rural population of our country. We at the Bureau of Labor Statistics have a great deal of interest in this area, although, of course, primary responsibility within the United States Government for issues relating to rural America is in the Department of Agriculture. I am pleased to see that the Committee will hear this morning from Agriculture Department representatives who have expert knowledge about the issues in which the Committee is interested.

We all recognize that we do not have all the data we would like about rural Americans, especially when policy decisions need to be made that affect local areas of the country. Conditions of rural life differ in important respects from those in urban areas, and, at times, the concepts and definitions used in our national surveys may not be fully appropriate for the rural economy. This is especially true in the labor market, where rural job opportunities are affected by weather, where part-time work can be an important factor,

and where wages are often comparatively low. It is also true in the price measurement area, since families living in rural areas may have different needs and spending patterns than those living in urban areas do, and major purchases are often made on shopping excursions to adjacent urban areas.

In addition, of course, survey estimates are difficult to produce for small groups of the population. Local area data are usually very expensive to collect and are often subject to considerable sampling and nonsampling errors. This set of circumstances reduces our ability to identify with confidence some of the issues that may need our attention.

While all that I have said about data difficulties is true, we should not overlook the fact that a considerable amount of data on the Nation's rural economy does exist. And I am pleased to be able to tell you that more is on its way--from the Bureau of Labor Statistics monthly labor force survey and from our Consumer Expenditure Survey. Some of the news on data availability is, therefore, quite good.

EMPLOYMENT AND UNEMPLOYMENT

The work that is currently under way in connection with the redesign of the Current Population Survey will permit the regular publication of new data (beginning next year) on the labor force status of rural Americans. We will be able to separate those data from those relating to urban Americans

and to analyze the differences between them. For this purpose, rural areas have been defined as those with a population density of less than 1,000 persons per square mile, or, for towns, those with a population less than 2,500. These data will be quite different from the data we have published in the past for "nonmetropolitan areas," which include large urban components.

I would like to share with the Committee some data that we have just developed covering the first quarter of 1985. These data show that the population of persons of labor force age (16 years and over) living in rural areas totaled 52.2 million. This was 29 percent of the total population of labor force age in the country of 177.5 million. The overall unemployment rate in rural areas was 8.0 percent (not seasonally adjusted), compared to a rate of 7.7 percent in urban areas.

A more important difference between rural and urban areas can be found in the proportion of the population that was employed (the employment-population ratio). The rural employment-population ratio of 58.4 percent was a full percentage point lower than the urban ratio (and seven-tenths of a point below that for the Nation as a whole). All of this difference was accounted for by rural adult women, whose employment-population ratio was nearly 2 percentage points below the national average. It should be noted that young

people in the 16-24 year age group had much higher employment-population ratios than those for the country as a whole; the ratio for rural adult men was about the same for the United States overall.

The age distribution for rural areas is not much different from that for the Nation as a whole, although there are somewhat fewer young people. Whites are much more likely to dwell in rural areas, with 31 percent of the population of labor force age living there. This contrasts markedly with the 15 percent for blacks and the 10 percent for Hispanics who live in rural areas.

A look at unemployment rates shows that rural blacks have lower unemployment rates than urban blacks do (13.4 percent in rural areas versus 15.8 percent). This differs from the situation for whites, where the rural rate, at 7.6 percent, is higher than the urban rate (6.5 percent) and for Hispanics (13.6 percent in rural areas versus 10.8 percent in urban ones).

But conditions in rural areas suggest that the unemployment rate may not be a very good measure of the labor market status of those who live in rural America. The figures cited above suggest that, in general, the incidence of unemployment in rural areas was not materially different from what it was in urban areas. But we know that work in rural areas is often seasonal and that many of those living in these areas

may have sustained periods of time without work. They are not counted among the unemployed if they are not actually seeking work. This is often the case, for example, in the winter months when all residents of the area realize that no jobs are available. This kind of underutilization, which is so pervasive in our rural economies, is difficult to define and even more difficult to survey because the data secured would be more subjective than those which are based on our official definition, which requires search activity.

Another tough concept to measure adequately is invisible "underemployment," in which the work people do is inadequate because it does not make full use of their skills or inadequately remunerates them. This is sometimes more of a problem in rural areas than it is in urban areas.

Rural areas accounted for 28 percent of total nonagricultural employment in the first quarter of 1985--about the same as their proportion of the population. Agriculture itself accounts for only about 7 percent of the employment total in rural areas.

LOCAL AREA UNEMPLOYMENT ESTIMATES

I am sure that the Committee is also interested in the data produced for States and local areas, many of which, of course, are rural. The BLS compiles and publishes monthly labor force and unemployment estimates produced by cooperating

State Employment Security Agencies for all States and approximately 4,600 sub-State areas. These areas include all metropolitan areas, counties, and those cities which have a population of 50,000 or more. Many of these small sub-state areas are primarily rural in character.

Although the Bureau of Labor Statistics has made a number of important improvements in the methods for calculating local area unemployment statistics, the starting point of the estimate is still a count of residents claiming Unemployment Insurance (UI) benefits under State law. Other data elements enter into the calculation of the estimates, but the UI data, which are affected by the same problems of rural underemployment that I just mentioned, are an important block in building the estimates.

Many of the areas for which data are needed are quite small and are subject to large relative error. I do understand the need for local area data, but I am concerned about the policy determinations that are often made as if there were no errors associated with small area estimates. It is unfortunate but true that, the smaller the area, the more difficult the problem becomes. Even in the most sophisticated surveys, estimates for small areas are extremely expensive to produce with accuracy.

CONSUMER EXPENDITURES

Labor market data for the rural population as a whole can be quite useful in determining the well-being of those who live in the rural parts of our country. In addition to data from our monthly labor force survey, BLS also has data on the rural population from our Consumer Expenditure Survey, for the year 1980. The purpose of this survey, which now includes rural areas on a continuing basis, is to obtain an account of consumer spending by different types of households. A nationally representative sample of about 5,000 households were interviewed, of which about 18 percent were in rural areas outside of Standard Metropolitan Statistical Areas (SMSA's). The differences in the socio-economic characteristics between the average rural and average urban household contribute to the differences in expenditure patterns. The average rural household has lower family income, large family size, an older householder, more vehicles per household and is more likely to own its own home than its urban counterpart. Other factors, such as costs of housing, availability of public transportation and other services and the availability of home grown food, would also influence the pattern of consumption.

The data for 1980 show that the rural consumer units, in line with their lower income, have lower levels of spending than do urban consumers. The distribution of expenditures

among budget categories is similar for the two groups, with two major exceptions. Urban consumers spend a higher proportion of their budgets on housing--33 percent--compared with 28 percent for rural consumers. On the other hand, rural consumers spend a larger proportion on transportation than do urban households (27 versus 23 percent). The other major component of spending, food, takes only a slightly larger share for rural households, probably because family size is larger, but rural households tend to spend a smaller proportion of their food expenditures on food away from home.

In 1981, the rural portion of the Consumer Expenditure Survey sample was dropped because of budget reductions in FY 1982. I am pleased to tell you that the rural component of the sample was reinstated in 1984, and data will be available on rural area consumer expenditures from that time forward on an ongoing basis.

I will now be happy to answer any questions that the Committee might wish to ask.

Senator ABDNOR. Thank you, Ms. Norwood, for that very fine statement.

First of all, I have a letter I would like you to submit to Secretary Brock. I am sure you will be the one responding to the letter because you are the expert in the field. But I would like you to deliver it if you would.

Ms. NORWOOD. I would be glad to.

Senator ABDNOR. I am asking for an extensive rural labor study. Mr. Jahr has a copy of it here, and why don't you take it down to Ms. Norwood.

I am also at the same time submitting the same letter to Agriculture Secretary John Block, and I believe Mr. Kibler is here to receive it. He is the Administrator of the Statistical Reporting Service of the USDA.

These two persons of course are the experts on the labor statistics, and it is my hope that his letter will produce a cooperative and a comprehensive analysis of what I call the forgotten labor force.

I recognize what you are saying is that it is an extremely difficult challenge and probably expensive, too, but I think policymakers ought to have timely and accurate information on rural conditions, and it has been a real concern of mine ever since I have been in Washington.

Many people tell me the programs work and that everything is great in this country. I do realize the economic indicators have tapered off in the last few months, but we have had a couple of pretty good years, and when I go home, I never find the rural areas in an economic boom like I hear they should be experiencing. That is the problem.

When I return to Washington, I see many that are designed to help the unemployed. Some of these grants and programs are going to be reduced, but nevertheless, there are still going to be many in existence. They keep using unemployment as such a key factor in every program. That disturbs me greatly because I don't think it gives equitable treatment to rural areas.

I understand it may be expensive to collect better rural figures but maybe you people by getting your heads together and pooling your resources can figure out how to come up with somewhat more accurate information on the rural labor conditions.

The nonagricultural rural labor force has, we will have to admit, been overlooked long enough. We talked about that earlier, and it is my hope that Secretaries Brock and Block will report preliminary findings by the end of the summer so we can publish it in our fall report.

I know that is asking a lot, but I think the problems are serious enough out in rural America that with a strong effort some kind of information or findings can be brought to light.

If Mr. Dale Jahr, of the committee staff, can be of any help to you on this subject please don't hesitate to ask.

Mr. Kibler, do you have any comments?

TESTIMONY OF WILLIAM E. KIBLER, ADMINISTRATOR, STATISTICAL REPORTING SERVICE, DEPARTMENT OF AGRICULTURE

Mr. KIBLER. Well, I mentioned to you, Senator, that we reinstated a survey to pick up at least the farm portion of the rural labor force beginning in 1985. Ms. Norwood and her staff have cooperated very closely with us in getting that re-established because, not only does it provide us with more information than we had in the past about the farm labor force, but it also provides some very reliable data for the Department of Labor to administer the adverse effect wage rate program that they are responsible for there.

So I feel that we do have the farm labor component covered better today than we would have had 1 year ago had we been testifying then.

Senator ABDNOR. I appreciate that, but as I listened to Ms. Norwood I think she said so many percent of the rural area is agricultural workers.

Mr. KIBLER. She said 7 percent I believe.

Ms. NORWOOD. Seven percent.

Senator ABDNOR. That leaves an awful lot of other people out there that we are not hearing about.

Ms. NORWOOD. Senator, we do cover those people who live in rural areas which are part of the metropolitan statistical areas in all of the work—

Senator ABDNOR. Wait a minute. These figures are not clear to me. At what point are they not metropolitan?

Ms. NORWOOD. The rural population can be divided into its non-metropolitan portion and that portion which, according to OMB definitions, is a part of the metropolitan statistical area.

In all of the work that we at the Bureau of Labor Statistics do, that part of the rural population that is within those statistical areas is covered. Those which are rural farm or nonfarm outside MSA's are not covered.

Mr. Kibler's group does, in addition, some considerable work with the farm portion.

Senator ABDNOR. Well, how far do you go? Do you get into the farm? Do you take into consideration the farmer who has got a fellow working for him for the summer and then lays him off in the winter?

Mr. KIBLER. We collect the data that are associated with people actually employed on the farm regardless of whether they are in the standard metropolitan statistical areas or in the rural labor force.

I think what Ms. Norwood is pointing out is that there would be in some of the standard metropolitan statistical areas an entire county in which there would be urban built up areas as well as some rural open county areas.

Senator ABDNOR. Yes, but what if you don't have any urban area and then what do we have? We have got a lot of area to cover. I don't know what constitutes urban but I thought it did have a definition. How about a whole 50-mile area that has got nothing but towns with populations of 1,000 or 1,200 or 400 or 500. Who reports that?

Ms. NORWOOD. Well, they may very well be within metropolitan areas. In fact, about 48 percent of the rural population lives in metropolitan areas.

Senator ABDNOR. Well, that is probably right. But what is the definition of a metropolitan area?

Mr. KIBLER. Well, as a rule it is a built up, densely settled area, but it generally follows geographic political subdivision boundaries in some way or another. For example, a whole county that has a city like Kansas City in it, as well as some rural areas. That is what Ms. Norwood is saying.

Senator ABDNOR. Let me stop you. Tell me, both of you, how do you measure South Dakota? I want to hear this. What have you got out there that is measuring my State for unemployment?

Ms. NORWOOD. For unemployment we have estimates for the State of South Dakota. And, as I indicated in my statement, those estimates are built up by our cooperating State partners in South Dakota according to methods which we prescribe.

Senator ABDNOR. Who are some of those cooperating?

Ms. NORWOOD. The Employment Security Agency in the State of South Dakota has a research and statistical unit, and the Agriculture Department as well has a very well developed Federal-State cooperative statistical program. Both Agriculture and Labor work together with the States to provide data which will be useful to the State, as well as to the Federal Government without duplicating the effort.

The local area unemployment statistics program that BLS has responsibility for is based upon a cooperative system with the State.

Now I do want to underscore the fact that the smaller the area within the State, the more difficult it is to develop reliable estimates because, unless you do a complete census of the population every single month, the estimates for the small areas have very large sampling errors.

I do want to tell you, however, that as a part of the redesign of the Current Population Survey, which is well underway and will be finished shortly, we are improving the data for each of the 50 States. On an annual average basis we will have data that meet a higher standard of reliability than has been true in the past.

And we are doing that, I am very pleased to say, by more effective sampling so that it will not cost more money.

Senator ABDNOR. Well, I appreciate that it doesn't cost more money. That is the kind of crucial information that is needed if we are going to build an economic program based on collected figures for the whole Nation.

I remember about 1½ years ago we were screaming for a job bill here in Congress and they started out talking about many billions of dollars. Finally, with help from the President and OMB, we got it cut down to \$1 billion. Those figures they were tossing in, as far as I was concerned, were ridiculous.

It came to be a surprise to me that on this issue, South Dakota and New York had something in common. Senator D'Amato and myself almost carried on a filibuster in order to have funds go to more than just the 12 highest unemployed States in the Nation. As

soon as that was agreed upon, we were going to turn the whole darned thing over to them.

I have never forgotten that, and I have wondered about this ever since. They brought a bunch of figures out at us and made it look great. But there were so many things that those figures didn't include that should have been factors in a program like that, and it has bothered me ever since.

If we have to shovel a few million dollars into unemployment aids, I think accurate figures for the rural sector are important. Accurate figures are especially important if you are going to build your foundation for whatever program you come out with.

I was surprised that only 8 percent of the population makes up the rural area. There is a lot of work force in the rural sector and unemployment is higher than is reported. Did you say off-farm rural unemployment is usually higher? Could you tell me, Mr. Kibler or maybe Ms. Norwood?

Ms. NORWOOD. Even within farm areas not everyone is working on a farm. There are services that are provided to people who work on farms. And also, there are a number of people in this country who work some distance from where they live. They may live on a farm and travel some distance to a job.

So there are all kinds of changes in work and family patterns that are developing, and I think our data system has kept up with them fairly well.

The difficulty that occurs in terms of unemployment is twofold. One is that generally what people want is data for very small areas. You know, there are not many people who live in the United States only. Almost everyone lives in some local area, some city or town and some State as well as in the aggregate that is called the United States. Those of us in the statistical system—

Senator ABDNOR. Did you say most people who live in rural areas really live in another larger part, too?

Ms. NORWOOD. No. I am just saying that any one of us, you and I and Mr. Kibler, we are all living in some particular area which is then aggregated to a State and then that is aggregated to the United States. Well, when you get to the U.S. level, those of us in the survey business know that it is fairly easy generally speaking to develop a survey design to produce the data, and you can do certain things at the State level. When you get below that level to areas where the population may be quite dispersed and very small, then it becomes extremely difficult to produce accurate data without doing a census each time you want some information.

Then there is the second problem that we have in dealing with unemployment in a rural area, and that is that economic behavior, economic activity is somewhat different in the rural areas than elsewhere.

We have a definition for unemployment which I think serves the Nation as a whole quite well. It requires that a person who is classified as unemployed not have worked at all—in general not for an hour or more during the survey week—be available for work and have searched for work during the preceding 4 weeks.

Now if you are living in an agricultural area and it is wintertime and you have been working on the farm, you are not going to go

out and look for work on the farm because you know that there isn't any work that is available at all.

So one can question the use of definitions of that kind for a particular part of the population.

In addition, in rural areas there are probably a great many more individually employed people, that is, people who are own account workers. They work for themselves rather than for large business establishments. So you can't obtain information on them through payroll records, for example.

Senator ARNDSON. Everything you have said is very true, and I think it just points up how complex it is to get an accurate reading in some areas of the country. My State is a good example. We don't have unemployment compensation, and I have got a hunch you look at those, too, when you are making up your figures. Most South Dakotans don't know what unemployment compensation really is. They are really in tough shape when they are laid off. But we don't always know how poor we are compared to the national level. If the farmers in South Dakota saw the poverty level indicators they would find out how bad a shape they are really in. It may be fortunate that we don't hear too many figures out there.

I do think when it comes to the record we ought to have accurate figures. For instance, South Dakota has a healthy business climate that doesn't include the farmers. I have here the USA Today article entitled "South Dakota tops ranking on biz climate." Within the article, some accurate figures are listed that show there are a lot of people out there ready to go to work.

[The article referred to follows:]

[From USA Today, Monday, June 10, 1985]

South Dakota tops ranking on biz climate

By Jack Kelley
USA TODAY

South Dakota has the USA's most attractive business climate for manufacturing companies, according to a survey by Alexander Grant & Co.

The survey shows that while the Sun Belt leads the nation as the top manufacturing area, the North Central states are rapidly closing the gap.

Three of the top four states — South Dakota, North Dakota and Nebraska — are in the North Central region. Five of the top 10 are in the Southeast.

"We spent a lot of money and a lot of time trying to make this state attractive and it's paying off for us," says South Dakota's Republican Gov. Bill Janklow.

"Our tax climate is the most healthy in the nation. We have no corporate or personal income tax. Nobody can be better than that," Janklow said.

Alexander Grant, a Chicago-based accounting and consult-

ing firm, ranked the 48 contiguous states on 22 factors including amount of state and local taxes per \$1,000 of personal income, hourly manufacturing wages, fuel and energy costs, and average unemployment compensation per year.

The survey also shows:

- South Dakota, which was in second place last year, has the lowest state and local government debt per capita, lowest fuel and energy costs and the least amount of work time lost from work stoppages.

- Michigan, which ranked last in the survey, has the highest average hourly manufacturing wage and biggest projected population loss.

- Maine was the only state to register an increase of more than 10% in union membership. Union membership slipped in all USA regions from 29% of total manufacturing employment last year to 27%.

■ State-by-state ranks, 48

Business climate: Ranking the best

Manufacturing executives regard the South East as the USA's most attractive region to operate a business, although states in the North Central region are rapidly closing the gap. Florida ranked first for three consecutive years, lost its top ranking and dropped to third place behind South Dakota and North Dakota, according to a survey conducted by Alexander Grant & Co. Inc., a business public accounting firm. The states ranked below Hawaii and Alaska. Job outlook: A. The job market is

| National rank | | National rank | |
|---------------|-----------|---------------|-----------|
| | 1983 1984 | | 1983 1984 |
| Ala. | 19 20 | W.V. | 40 39 |
| Ariz. | 5 12 | N.D. | 3 2 |
| Ark. | 31 30 | N.H. | 42 41 |
| Calif. | 30 25 | N.J. | 29 24 |
| Colo. | 18 15 | N.M. | 38 37 |
| Conn. | 34 36 | N.Y. | 39 38 |
| Del. | 31 32 | Nev. | 23 17 |
| Fla. | 1 3 | Okla. | 21 23 |
| Ga. | 20 19 | Pa. | 41 39 |
| Idaho | 17 18 | R.I. | 43 42 |
| Ind. | 25 22 | S.C. | 15 14 |
| Iowa | 31 26 | Tenn. | 14 10 |
| Kan. | 11 13 | Utah | 8 5 |
| Kent. | 32 33 | Vt. | 35 33 |
| La. | 16 40 | Wash. | 38 37 |
| Mass. | 33 28 | Wyo. | 32 43 |
| Mich. | 48 48 | | |
| Miss. | 7 6 | | |
| Mont. | 20 34 | | |

Senator ABDNOR. I think my State does work on improving the business climate. I am happy about it, but I just think that until you really have got some accuracy to the figures, I don't think we are really showing what is happening in rural America.

I go around this Congress, and I can't find people who understand rural America. I am not just talking about South Dakota. A third of those Members on the House side represent a lot of rural areas in their districts. However, I will bet that the rest of those people wouldn't have the slightest idea of what goes on out in rural America and how tough it really is right now. When they do listen to the realities that rural Americans are facing, they are shocked.

We hope to get some decent reports out of this hearing and send them out to Members of Congress. I know how many things go through their desks, but we are trying to put figures and statistics together and point out that there is a big area of this country that has not quite experienced the economic prosperity that other areas of the country have.

When you have 75 percent of the people living on 2 percent of the land, you have problems in trying to get Washington policymakers recognize the real facts about rural America.

That is why we have asked you to come up here, and we appreciate your testimony a great deal. However, we have only scratched the surface of the problem.

Would you mind if we submit some written questions to you when we really know what we are trying to arrive at here.

Ms. NORWOOD. Surely.

Senator ABDNOR. I know you will be of great assistance to us, as you both have been today. We are looking forward to working with you in the days ahead. I would love to pursue this because I have a lot of questions I want to ask you, but we are constrained by time here with the Prime Minister of India here in town. So we thank you very, very much.

Mr. KIBLER. Thank you.

Ms. NORWOOD. Thank you, Senator.

Senator ABDNOR. I am going to ask the next witnesses to appear as a panel, Mr. Robert Coltrane of the Economic Research Service for the Department of Agriculture; Mr. Vernon Briggs, of the Industrial Labor Relations Institute, Cornell University; and Mr. Glen Pulver, professor of agriculture economics at the University of Wisconsin.

Gentlemen, I feel very privileged to be able to have you before us today. We look long and hard for the real experts that we think have the background to give us the information we are looking for. Unemployment is such a big part of our economic picture that I think we could do a better job in coming up with some figures and facts and thoughts and ideas. So we are extremely happy to have all of you here today. Mr. Coltrane, would you care to start out.

STATEMENT OF ROBERT L. COLTRANE, ECONOMIC RESEARCH SERVICE, DEPARTMENT OF AGRICULTURE

Mr. COLTRANE. Thank you, Mr. Chairman. I appreciate this opportunity to appear here today to discuss rural labor force data issues.

I will give a brief summary of my prepared statement, which I believe you already have.

Senator ABDNOR. Yes.

Mr. COLTRANE. There are no comprehensive data collecting activities at the Federal level specifically for the rural labor force. However, rural labor force data are available from several sources and, as we heard a moment ago, there are going to be some improvements made in the quality and in the amount of rural data.

Currently, data are available from the Decennial Censuses, the Current Population Survey, and the Survey of Income and Program Participation, a survey conducted by the Bureau of the Census.

Statistics on the rural labor force are derived from these activities by tabulation or estimation of data for the rural or the nonmetropolitan parts of the nation. Additional rural labor information is available from data series based on industry statistics which are provided by employers. These data normally provide information on industry or firm characteristics related to employment and wages instead of characteristics of the labor force.

The quality of labor force statistics for rural areas is generally lower than the quality of national level data or the quality of metro labor force statistics. This was the conclusion of several studies of the adequacy of rural labor force data for policy and program operations and analyses. A comprehensive study of statistics for rural areas was completed in 1981 by the National Research Council of the National Academy of Sciences. In that study the conclusion was reached, and I quote,

Data on public and private economic activities in small areas are inadequate for evaluating the effects of governmental policies and programs on geographic patterns of development. Society's ability to alleviate the problems of the needy, who are still disproportionately concentrated in rural areas is handicapped by the lack of data on target populations, program recipients and program effects.

Other studies which have concluded that the information base for rural development policy and research is not adequate were conducted by the National Commission on Employment and Unemployment Statistics in 1979, and the American Agricultural Economics Association in cooperation with the U.S. Department of Agriculture in 1977.

These studies demonstrated that the quality of rural labor force statistics is low because much of the data are not collected frequently enough. In other words, it is difficult to find current statistics.

Much of the data are based on surveys in which the survey design does not permit adequate coverage of sparsely settled rural areas. There seems to be some improvement forthcoming in that, however.

This inadequate coverage in turn, affects the accuracy and statistical reliability of the data. Also, the quality of data are low because much of the data are not comparable over time. We need data over time in order to identify current problems and persistent problems, and to recommend means to improve the situation.

Another major reason that the data are of low quality is that definitions of some key labor force measures, especially unemploy-

ment, may not measure what they are purported to measure in rural labor markets.

I have explored in some detail these reasons in the prepared statement, and I won't go into them at this time.

However, I would like to take a moment and summarize what we know about the rural labor force and why we need data for small areas.

A major concern of both the users and producers of rural labor force statistics is the definition of rural. The Bureau of the Census defines places as rural when they have less than 2,500 persons. Thus, a county, a major political unit in most States, often contains both rural and urban places. Because of this, many data producers and users have suggested that counties or aggregates of counties are the more appropriate geographic unit for reporting labor force statistics.

Much of the Federal labor force data for rural areas is actually reported for the nonmetropolitan counties or aggregates of nonmetropolitan counties. Nonmetropolitan areas are those parts of the United States that are not in metropolitan statistical areas. Because more data are available for nonmetropolitan areas than rural areas, most of the analyses of the rural labor force are based on nonmetro statistics. These two terms for rural America are frequently used interchangeably, but according to census definitions and data, rural and nonmetro areas contain distinctly different labor forces.

Rural areas, based upon nonmetro statistics, have a significant share of the Nation's labor force. About 31 percent of the civilian labor force, about 30 percent of all employed persons and about 33 percent of the unemployed reside in nonmetro areas. The proportion of the adult population which is employed is lower in nonmetro areas than in metro areas—57 percent compared to 61 percent. And nonmetro unemployment rates in recent years have been consistently higher than metro rates. Nonmetro areas have as residents about 38 percent of all persons in poverty and the medium income of nonmetro families is only 80 percent of the median income of metropolitan families.

The industrial structure of rural America has become more like the rest of the Nation during the last four decades. However, there continues to be enough differences in the economic structure of rural and urban areas to require detailed rural labor force statistics for policy formulation and other uses. Agriculture remains more important in nonmetro areas today than in the rest of the Nation, but it is only one of many important sectors. Overall, about 7 percent of the total employment in nonmetro areas is in agriculture. This compares to a little over 1 percent of the metro area employment that is in agriculture.

However, the differences regarding the importance of agriculture among nonmetro counties is striking. The Economic Research Service has recently estimated that about 700, or 29 percent of all nonmetro counties are farming independent. In other words, most of the employed people in those counties depend upon farming for some or all of their income.

But because the counties are sparsely settled, only 13 percent of all the nonmetro employed residents in the Nation reside in these

counties. With agriculture as the major industry in these 700 counties, much of their nonagricultural economic activity is economically dependent on conditions of the farm sector. The farming dependent counties are concentrated geographically in the Western Corn Belt and the Great Plains States, but some of the counties are located in the South and other regions.

There are proportionately fewer jobs in the private service sector in nonmetro areas than in metro areas. About one-third of the employment in metro areas is in services, but less than one-fourth of all nonmetro employment is in that sector. However, the service sector is a major source of new jobs in both nonmetro and metro areas today.

Manufacturing employment comprises about a fifth of the total in both metro and nonmetro areas. But the type of manufacturing in nonmetro areas is generally different from that found in metro areas. Nonmetro manufacturing is more likely to be nondurable goods producing, low wage and labor intensive.

These statistics show that there is a lot of diversity in the economic structure among nonmetro areas. Thus, accurate data for small areas are required to properly analyze and evaluate economic conditions in these areas. Thank you.

[The prepared statement of Mr. Coltrane follows:]

PREPARED STATEMENT OF ROBERT I. COLTRANE
RURAL LABOR FORCE DATA ISSUES

Mr. Chairman, members of the Committee, I appreciate this opportunity to discuss rural labor force data issues.

Rural labor force statistics are needed for policy analyses, program implementation, and research. Within these broad data need categories, data are used to define economic and social problems, measure economic distress, assess the performance of labor markets and labor-oriented programs, and allocate Federal funds to state governments and local communities. Inadequate data may adversely affect the formulation of rural policy, the evaluation of program implementation, and may impede access of rural communities and rural labor markets to Federal resources for human resource and economic development.

There are no comprehensive data collecting activities at the Federal level specifically for the rural labor force. However, rural labor force data are available from the Decennial Censuses, the Current Population Survey (CPS), and the Survey of Income and Program Participation (SIIPP), conducted by the Bureau of the Census. Statistics on the rural labor force are derived from these activities by tabulation or estimation of data for the rural or nonmetropolitan parts of the Nation. Additional rural labor information is available from data series based on industry statistics which are provided by employers. These data normally provide information on industry (or firm) characteristics related to employment and wages instead of characteristics of the labor force.

The quality of labor force statistics for rural areas is generally lower than the quality of national level data or the quality of metro labor force statistics. This was the conclusion of several studies of the adequacy of rural labor force data for policy, program operations, and analyses. A comprehensive study of statistics for rural areas was completed in 1981 by the National Research Council of the National Academy of Sciences. In that study, the conclusion was reached that "Data on public and private economic activities in small areas are inadequate for evaluating the effects of governmental policies and programs on geographic patterns of development. Society's ability to alleviate the problems of the needy, who are still disproportionately concentrated in rural areas, is handicapped by the lack of data on target populations, program recipients, and program effects". Other studies which have concluded that the information base for rural development policy and research is not adequate were conducted by the National Commission on Employment and Unemployment Statistics, 1979, and the American Agricultural Economics Association in cooperation with the U.S. Department of Agriculture, 1977.

These studies demonstrated that the quality of rural labor force statistics is low because much of the data are not collected frequently enough; much of the data are based on surveys in which the survey design does not permit adequate coverage of sparsely-settled rural areas, which affects the accuracy and statistical reliability of the data; much of the data are not comparable over time; or the definitions of some key labor force measures, especially unemployment, may not measure what they are purported to measure in rural labor markets.

These issues are addressed later in my testimony.

The Rural Labor Force

A major concern of both the users and producers of rural labor force statistics is the definition of rural. The Bureau of the Census defines rural as places with less than 2,500 persons. Thus a county, a major political unit in most states, often contains both rural and urban places. Because of this, data producers and users have suggested that counties, or aggregates of counties, are the more appropriate geographic unit for reporting labor force statistics. Much of the Federal labor force data for "rural" areas is actually reported for nonmetropolitan counties or aggregates of nonmetropolitan counties. Nonmetropolitan areas are those parts of the United States not included in Metropolitan Statistical Areas. Because more data are available for nonmetro areas than rural areas, most of the analyses of the "rural" labor force are based on nonmetro statistics. These two terms for rural America are frequently used interchangeably, but according to Census definitions and data, rural and nonmetro areas contain distinctly different labor forces.

Rural areas, based on nonmetropolitan statistics, have a significant share of the Nation's labor force (see attached tables and graph). About 31 percent of the labor force, 30 percent of all employed persons, and 33 percent of the unemployed reside in nonmetro areas. The proportion of the adult population which is employed is lower in nonmetro areas than in metro areas (57 percent compared to 61 percent), and nonmetro unemployment rates in recent years have been consistently higher than metro rates. Nonmetro areas have as residents about 38 percent of all persons in poverty, and the median income of nonmetro families is only 80 percent of the median income of metropolitan families.

The industry structure of rural America has become more like the rest of the

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Nation during the last four decades. However, there continues to be enough difference in the economic structure of nonmetro and metro areas to require detailed rural labor force statistics for policy formulation and other uses. Agriculture remains more important in nonmetro areas today than in the rest of the Nation, but it is only one of many important sectors. Overall, 7 percent of the total employment in nonmetro areas is in agriculture, compared to about 1.4 percent in metro areas. However, the heterogeneity regarding the importance of agriculture among nonmetro counties is striking. The Economic Research Service, USDA, estimates that about 700, or 29 percent of all nonmetro counties, are farming-dependent. But, because these counties are sparsely-settled, only 13 percent of all employed nonmetro residents reside in these counties. With agriculture as the major industry in these counties, much of their nonagricultural economic activity is economically dependent on conditions of the farm sector. The farming-dependent counties are concentrated geographically in the Western Corn Belt and Great Plains States, but some of the counties are located in the South and in other regions.

There are proportionally fewer jobs in the private service sector in nonmetro areas than in metro areas. The service sector includes business, personal, transportation, communication, and financial services. About one-third of the employment in metro areas is in services, but less than one-fourth of all nonmetro employment is in that sector. The service sector is the major source of new jobs in both nonmetro and metro areas.

Manufacturing employment comprises about one-fifth of the total in both areas, but the type of manufacturing in nonmetro areas is generally different from that found in metro areas. Nonmetropolitan manufacturing is more likely to be nondurable goods-producing, low-wage, and labor-intensive.

Data Issues

Users of data believe that data are inadequate when the available data system does not supply what they need for their work. Data may be inadequate because they are out-of-date, they do not represent well the target population, they are not strictly comparable over time, they are not as reliable statistically as desired, or the definitions of key measures are inadequate. However, data users characteristically have an insatiable desire for information to be made available to them more frequently and in greater detail than is forthcoming from the data system. Collecting information, processing it into statistical data, and making the data available to users are very costly and time-consuming activities. Because of time and financial constraints, it is not feasible for the Federal data system to satisfy all the needs of rural data users.

Data for some labor force variables are needed for national policy while other data are needed for use only at the local level. National policy not only requires national level aggregates, but it also requires estimates at the state and local levels. The state and local data are necessary so that reliable comparisons of progress and needs can be made between areas and to give local areas equity in access to Federal resources to correct local economic problems. The labor force variables useful for national policy include the labor force, employment, unemployment, hours worked, earnings, employment by occupation and industry, and related characteristics. The usefulness of the data is enhanced when these variables are disaggregated by age, gender, and racial/ethnic characteristics of workers. The Federal data system may be in the best position to collect these data because the estimates need to be comparable in definition and accuracy at all geographic and nonmetro and metro levels. This can

be achieved only when the same procedures and standards are used uniformly across the Nation to collect information.

Local areas are in the best position to collect the information that only they need for policy and other uses. This type of information is frequently used for some specific function. For example, a community may require estimates of its potential labor supply for an electric motor assembly plant whose owners have expressed an interest in locating in that community. Another community may want to compare the skill levels required by local employers of their employees with the skill levels of the local labor force determine if a technical training school is needed. It is not financially feasible for the Federal data system to collect these types of detailed data.

Earlier in my testimony I mentioned several issues concerning the quality of rural labor force statistics. I will now address those issues as they apply to Federal rural labor force data.

Timeliness of Data

Current labor force statistics are needed for rural areas, as for the rest of the Nation, for policy and program functions. The Government's ability to properly define and address economic issues is handicapped when adequate data are not available to determine the current status of the labor force, how its status is changing, and why it is changing.

The Census of Population is the only source which provides comprehensive labor force statistics for all counties. The nonmetro labor force can be identified from these data using the Metropolitan Statistical Area (MSA) designation for

counties and cities. All counties not in Metropolitan Statistical Areas are nonmetro counties. However, the Census of Population data are soon out-of-date because they are collected only decennially. Nevertheless, because they are the best data available, some formulas which allocate Federal funds to local areas use Census data, or estimates based on Census data, even after the data are out-of-date. A census conducted at mid-decade would greatly improve the accuracy of statistics needed for Federal programs.

Some of the Census labor force information becomes dated sooner than other information. Numerical counts of the labor force, employment, and unemployment are out-of-date very quickly because of constant changes in the population and the level of economic activity in most areas. Other Census data which indicate occupational and industrial distributions are useful for longer periods because changes in the economic structure of most areas occur more slowly.

Survey Procedures Provide Inadequate Coverage of the Rural Labor Force

Rural labor force statistics should accurately represent the rural labor force, as well as being up-to-date. Inaccurate or incomplete data may result in rural residents having inequitable access to Federal programs.

The Current Population Survey (CPS) conducted each month by the Bureau of the Census, provides up-to-date national and state level data for major labor force characteristics. This survey is based on a sample of about 60,000 households selected from the 50 States and the District of Columbia. In addition to national and state labor force data, statistics are available individually for the larger metropolitan areas. Statistics for the nonmetro labor force are limited to aggregates for the U.S. nonmetro population as a whole and for the

nonmetro segments of about 41 states. Nonmetro data are not available for the remaining states because the number of households in the CPS sample in those states is too small to meet the Bureau of the Census' confidentiality requirements for release or publication of data. Moreover, the CPS nonmetro data available for some other states have low levels of statistical reliability, which raises questions about their accuracy. The CPS does not provide information on the status of the nonmetro labor force at the county level, which is needed for national policy and program administration. Because of the diversity of the economic structure and labor force among nonmetro counties, national aggregate data, or even state nonmetro totals may not identify problem situations unique to local areas.

Labor force data are available quarterly from the Survey of Income and Program Participation (SIPP), conducted by the Bureau of the Census. The purpose of this survey is to obtain information on the distribution of income and participation in government programs by individuals and households. The labor force information collected by SIPP is similar to that collected by the CPS, but the sample of households is smaller than the CPS sample. SIPP was started in 1983 and is scheduled to end in 1987. The labor force data are available for nonmetro areas as a whole, and like the CPS data, nonmetro statistics are not available below the state level.

Comparability Over Time

Time series data comparable in definition, geographic area, and accuracy are needed for the nonmetro labor force to evaluate progress and identify persistent and chronic problem areas. However, the compilation of nonmetro statistics with these desired characteristics is sometimes impossible because of the

frequent changes in the metropolitan designation of areas.

Nonmetro areas are the residual areas of the United States after the Metropolitan Statistical Areas are identified. When the population and economic characteristics of a nonmetro county correspond to the definition of Metropolitan Statistical Area, that county is eligible to be designated a MSA or added to an existing MSA. Between 1970 and 1985, there was a net loss of about 270 nonmetro counties due to the redesignation of MSA's by the Office of Management and Budget. These changes will be reflected in the statistics produced by the CPS later this year. As a consequence, nonmetro data representing the same areas in the 1970's and 1980's will not be available for the study of nonmetro labor force changes.

Changes in the nonmetro designation of counties is less of a problem for the analyst when data are available for individual counties. With county-level data, analysis is possible for the same group of counties over time. However, county labor force data are available only every ten years from the Census of Population. Due to frequent fluctuations in economic activity, data are required more often than at ten-year intervals for policy analysis.

Inadequate Labor Force Concepts For Rural Statistics

Employment and unemployment statistics are used widely as indicators of labor market performance. The unemployment rate is used to measure the underutilization of human resources in local areas, states, and the Nation. The residents of nonmetro areas have a stake in how accurately these statistics measure labor use, as Federal funds for human resource development are allocated to local jurisdictions on the basis of employment and unemployment statistics.

Studies conducted for the National Commission on Employment and Unemployment Statistics, and by the Economic Research Service, USDA, showed that unemployment rates do not adequately measure the underuse of labor in rural areas. In part, this is because the rates are not adjusted for the unemployment of discouraged workers and the underemployment of those workers on mandatory part-time work schedules who would prefer to work more hours. Adjustments in unemployment rates to account for those factors would affect unemployment statistics in metro, as well as nonmetro areas. But the structure of many nonmetro labor markets results in an additional undercount of unemployment relative to metro labor markets.

The incidence of self-employed workers is nearly twice as great in nonmetro as in metro areas. In 1984, 12.5 percent of nonmetro employment was self-employment, compared to about 7 percent of metro employment. Unemployment among self-employed workers usually occurs only after their self-employed business fails, but unreported underemployment occurs frequently with the self-employed. Some self-employed workers have a second wage and salary job, which reduces the underemployment for those workers. However, the results of an ERS study which estimated the effects of self-employment on unemployment rates showed that when the underemployment associated with self-employment was considered, the unemployment rate for nonmetro areas increased 21 percent, but the rate increased only 10 percent for metro areas.

A substantial number of workers in nonmetro labor markets are employed in seasonal jobs. These jobs are in farm production, in the marketing of agricultural products, in processing of food and fiber, in recreation and tourist

attractions, and in other activities. Many of these seasonal workers are at times underemployed, and that underemployment is not reflected in the unemployment rate.

The Panel on Statistics for Rural Development Policy of the National Academy of Sciences concluded in its 1981 study that because unemployment rates reported for rural areas are an inadequate measure of labor utilization, that a measure of underemployment should be included in employment and unemployment statistics. However, the Panel also found that additional research is needed to determine whether available data, and employment and unemployment concepts are adequate to construct a useful underemployment measure for rural areas.

Summary

Several studies have shown that the quality of labor force statistics for rural areas is not on a par with national or metro labor force statistics. The quality of rural data is low because much of the data collected are not collected frequently enough; much of the data have low levels of statistical reliability because they are based on surveys which do not adequately sample sparsely-settled rural areas; much of the data are not comparable over time; or the definition of unemployment does not include all aspects of unemployment, including underemployment, resulting in an overestimate of labor utilization in rural areas.

Inadequate data may adversely affect rural policy analysis, research results, program implementation, and impede rural peoples' access to Federal resources for human resource and community economic development. And, since Federal funds are sometimes allocated to local jurisdictions on the basis of employ-

ment and unemployment statistics. An undercount of unemployment in rural areas may mean that rural residents do not receive an equitable share of Federal resources.

A significant share of the Nation's labor force resides in nonmetro areas--30 percent of the employed and 33 percent of the unemployed. While, the economic structure of rural areas has become more like the rest of the Nation in recent decades, there continues to be significant differences in the economic structures, and in the labor forces of rural and urban areas. Hence, timely and reliable labor force statistics at the local level contribute to more informed policy and program administration for both urban and rural America.

Table 1—Civilian Labor Force and Employment, Metro/Nonmetro, 1979-1984

| Period | Civilian labor force | | Total employed | |
|-----------|----------------------|----------|----------------|----------|
| | Metro | Nonmetro | Metro | Nonmetro |
| Thousands | | | | |
| 1979 | 71,192 | 31,716 | 67,029 | 29,916 |
| 1980 | 72,207 | 32,512 | 67,120 | 30,150 |
| 1981 | 73,301 | 33,092 | 67,825 | 30,488 |
| 1982 | 76,465 | 33,740 | 69,192 | 30,335 |
| 1983 | 77,394 | 34,156 | 70,137 | 30,696 |
| 1984 | 78,819 | 34,725 | 73,076 | 31,930 |
| Q1 | 77,390 | 34,017 | 71,125 | 30,875 |
| Q2 | 79,130 | 34,469 | 73,389 | 31,789 |
| Q3 | 79,671 | 35,368 | 73,980 | 32,677 |
| Q4 | 79,084 | 35,047 | 73,809 | 32,377 |

Source: Current Population Survey. The Bureau of the Census.

Table 2—Distribution of Employment by Major Industry Groups, Metro/Nonmetro, 1979-1984

| Period | Agriculture ^{1/} | | Mining and construction | | Manufacturing | | Services ^{2/} | | All others ^{3/} | |
|---------|---------------------------|----------|-------------------------|----------|---------------|----------|------------------------|----------|--------------------------|----------|
| | Metro | Nonmetro | Metro | Nonmetro | Metro | Nonmetro | Metro | Nonmetro | Metro | Nonmetro |
| Percent | | | | | | | | | | |
| 1979 | 1.4 | 7.9 | 5.1 | 6.7 | 22.3 | 22.7 | 30.2 | 20.8 | 41.0 | 41.9 |
| 1980 | 1.4 | 7.9 | 5.0 | 6.5 | 21.4 | 22.2 | 30.9 | 21.1 | 41.3 | 42.3 |
| 1981 | 1.4 | 7.9 | 4.9 | 6.5 | 21.1 | 21.8 | 31.6 | 21.7 | 41.0 | 42.1 |
| 1982 | 1.5 | 8.0 | 4.7 | 6.1 | 19.7 | 20.2 | 32.7 | 22.5 | 41.4 | 43.2 |
| 1983 | 1.5 | 7.8 | 5.0 | 6.0 | 18.8 | 19.9 | 33.1 | 23.0 | 41.6 | 43.3 |
| 1984 | 1.4 | 7.3 | 5.2 | 6.3 | 19.0 | 20.5 | 33.3 | 23.1 | 41.1 | 42.8 |
| Q1 | 1.3 | 6.4 | 4.9 | 5.8 | 19.3 | 20.7 | 33.1 | 23.2 | 41.4 | 43.9 |
| Q2 | 1.5 | 7.7 | 5.1 | 6.3 | 18.9 | 20.6 | 33.4 | 23.2 | 41.1 | 42.2 |
| Q3 | 1.5 | 8.0 | 5.5 | 6.7 | 18.9 | 20.5 | 33.4 | 23.1 | 40.7 | 41.7 |
| Q4 | 1.3 | 7.0 | 5.2 | 6.4 | 19.0 | 20.5 | 33.3 | 22.8 | 41.2 | 43.3 |

^{1/} Includes wage and salary workers, self employed, and unpaid workers.^{2/} Includes business, health and personal services, as well as transportation, communications, public utilities, finances, insurance, and real estate.^{3/} Includes government, wholesale and retail trade, and nonprofit self employed and unpaid workers.

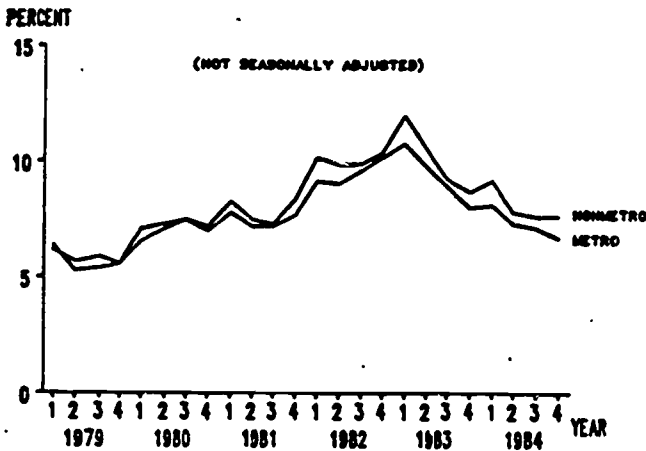
Source: Current Population Survey. The Bureau of the Census.

Table 3—Unemployment Rates for Metro/Nonmetro, 1979-1984 (not seasonally adjusted)

| Period | U.S. | All workers | | Whites | | Blacks and others | | Male | | Female | |
|--------|------|-------------|----------|--------|----------|----------------------|----------|-------|----------|--------|----------|
| | | Metro | Nonmetro | Metro | Nonmetro | Metro | Nonmetro | Metro | Nonmetro | Metro | Nonmetro |
| | | Percent | | | | | | | | | |
| | | | | | | | | | | | |
| 1979 | 5.8 | 5.8 | 5.7 | 5.0 | 5.2 | 11.3 | 11.1 | 5.2 | 4.8 | 6.7 | 7.0 |
| 1980 | 7.1 | 7.0 | 7.3 | 6.1 | 6.7 | 13.1 | 13.6 | 6.9 | 6.8 | 7.2 | 7.9 |
| 1981 | 7.6 | 7.5 | 7.9 | 6.4 | 7.3 | 14.2 | 14.6 | 7.3 | 7.4 | 7.7 | 8.5 |
| 1982 | 9.7 | 9.5 | 10.1 | 8.2 | 9.3 | 17.0 | 18.5 | 9.8 | 10.1 | 9.2 | 10.0 |
| 1983 | 9.6 | 9.4 | 10.1 | 8.0 | 9.2 | 17.5 | 19.0 | 9.8 | 10.3 | 8.9 | 9.9 |
| 1984 | 7.5 | 7.3 | 8.1 | 6.1 | 7.3 | 14.0 | 15.9 | 7.3 | 7.8 | 7.3 | 8.3 |
| Q1 | 8.4 | 8.1 | 9.2 | 6.9 | 8.5 | 14.8 | 17.1 | 8.4 | 9.8 | 7.7 | 8.5 |
| Q2 | 7.4 | 7.3 | 7.8 | 6.1 | 7.0 | 14.1 | 15.6 | 7.2 | 7.5 | 7.3 | 8.1 |
| Q3 | 7.3 | 7.1 | 7.6 | 5.9 | 6.7 | 14.3 | 16.0 | 6.8 | 6.7 | 7.6 | 8.8 |
| Q4 | 7.0 | 6.7 | 7.6 | 5.5 | 6.9 | 12.8 | 15.2 | 6.6 | 7.3 | 6.7 | 8.1 |

Source: Current Population Survey. The Bureau of the Census.

METRO/NONMETRO UNEMPLOYMENT RATES



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Senator ABDNOR. Thank you.

I would like to announce that Senator D'Amato is here. He is a very active member of this committee and I always look forward to having him here, and I am happy he was able to stop by.

I am sure you are aware of what we are trying to bring out here. I mentioned that you and I got involved in the labor bill some time back.

Senator D'AMATO. That was to adjust an aberration in the initial formula that would have been tremendously unfair to people in the smaller rural States such as your own, Senator.

Senator ABDNOR. Yes, sir, and that is how we got into this very subject.

Senator D'AMATO. I am wondering, Mr. Chairman, if I might in the interest of time ask that I be permitted to submit my opening statement for the record.

Senator ABDNOR. Without objection, and we are happy to have it be made a part of the record.

[The written opening statement of Senator D'Amato follows:]

WRITTEN OPENING STATEMENT OF HON. ALFONSE M. D'AMATO

MR. CHAIRMAN, I THANK YOU FOR CONDUCTING THIS IMPORTANT HEARING. I AM PLEASED TO HAVE TAKEN PART IN EACH OF YOUR PREVIOUS HEARINGS ON THE RURAL ECONOMY, AND I AM EQUALLY PLEASED TO BE HERE TO DISCUSS THE "RURAL LABOR FORCE."

POPULATION TRENDS HAVE SHIFTED DRAMATICALLY IN THE LAST 30 YEARS. IN THE 1950'S AND '60'S, MANY PEOPLE MOVED FROM RURAL AREAS TO THE METROPOLITAN CENTERS. THE PRIMARY REASON FOR THIS TREND WAS ECONOMIC; MORE OPPORTUNITIES WERE AVAILABLE IN THE BIG CITIES. THIS CAUSED A DRAMATIC DECREASE OF WORKERS IN FARMING, TIMBER, MINING, AND OTHER TRADITIONAL RURAL INDUSTRIES.

DURING THE '70'S, THE TREND REVERSED ITSELF AND PEOPLE BEGAN TO MOVE BACK TO NON-METROPOLITAN AREAS. HOWEVER, THESE PEOPLE RELOCATED FOR DIFFERENT REASONS. THEY WERE EDUCATED PEOPLE WHO SOUGHT A BETTER LIFE. THEY DID NOT MOVE FOR

ECONOMIC OPPORTUNITIES, BUT, RATHER, TO FIND A BETTER PLACE TO RAISE CHILDREN WHICH WAS FREE FROM CRIME, POLLUTION, AND OTHER DRAWBACKS OF CITY LIVING. MAJOR CORPORATIONS ALSO CONTRIBUTED TO THIS TREND BY DECENTRALIZING AND MOVING SOME OF THEIR OPERATIONS TO THE NON-METROPOLITAN AREAS, THEREBY CREATING MANY EMPLOYMENT OPPORTUNITIES.

PRESENTLY, WE ARE SEEING THE METROPOLITAN AREAS ONCE AGAIN EXPERIENCING GROWTH. CITIES ARE BEING REVITALIZED AND NEIGHBORHOODS THAT WERE CONSIDERED SLUMS ARE NOW FLOURISHING WITH ACTIVITY. HOWEVER, THIS SAME ACTIVITY IS NOT OCCURRING IN THE NON-METROPOLITAN AREAS. THE RECENT FARM CRISIS IS FORCING PEOPLE OFF OF FAMILY FARMS. THE MINING AND COAL INDUSTRIES HAVE NOT BOUNCED BACK FROM THE RECESSION OF THE EARLY '80'S. THE UNEMPLOYMENT RATE IN NON-METROPOLITAN AREAS HAS NOT COME DOWN AS MUCH AS THE UNEMPLOYMENT RATE IN METROPOLITAN AREAS.

ALTHOUGH THERE ARE MANY FACTORS THAT CONTRIBUTE TO THE HIGH RATE OF UNEMPLOYMENT IN NON-METROPOLITAN AREAS, THE TWO MOST PRESSING FACTORS ARE THE HIGH VALUE OF THE DOLLAR AND FOREIGN COMPETITION. THESE FACTORS MUST BE RECONCILED WITH. OUR LABOR FORCE MUST BE MADE STRONG AGAIN.

I BELIEVE WE CAN TURN THINGS AROUND. CONGRESS IS WORKING ARDUOUSLY TO PASS A BUDGET THAT WILL REDUCE THE DEFICIT BY AT LEAST \$55 BILLION. WE ARE ALSO TRYING TO SOLVE THE HUGE TRADE DEFICIT WE ARE CURRENTLY FACED WITH. I BELIEVE THAT, IF WE CAN GET THESE TWO FACTORS UNDER CONTROL, ALL AREAS IN THE UNITED STATES WILL AGAIN FLOURISH.

THANK YOU, MR. CHAIRMAN.

Senator ABDNOR. Would you care to summarize that or say something, if Mr. Briggs wouldn't mind.

Senator D'AMATO. Well, Mr. Chairman, No. 1, I think that the area that you have chosen to review today is one that is most topical, and I think it is important that we focus in on the shifting demographics of people who are moving from rural areas to metropolitan centers, and the prime reason I think in many cases is economic.

That is the reason that many of our young people, who, after we educate them, no longer seek to follow in the traditional family businesses. There is a trend, or there did appear to be a trend in the 1970's, for many reasons, of people moving to smaller communities for safety, better environment, and the tendency of major corporations to seek lower tax areas, as well as one that would offer certain amenities to its workers.

It would seem to me that there is tremendous strength in our rural areas and it is a great way of life. Those upstate communities that have been very hard hit as a result of the economic recession in New York State are not too dissimilar from those in the Dakotas and other areas.

People tend to think of New York as simply high-rise and subway and fail to realize that over 7 million people live north of Westchester and that indeed as we take a small plane and get the opportunity to view it, you see that there are great expanses of farmland and rural communities.

Let me say this, Cornell is just such a great resource to our State and to our Nation and it is one that I am so very proud of, notwithstanding the fact that I went to Syracuse—

[Laughter.]

Senator D'AMATO. But let me thank you, Mr. Biggs, for loaning your expertise to this hearing today, and I thank the chairman for his kind indulgence.

Senator ABDNOR. Thank you very much.

Mr. Briggs, we are anxious to hear from you.

Senator D'Amato has often told me about all that rural area you have in New York along with your cities. When he gets his New York day here with the agricultural products, he convinces me more and more how rural New York can be. [Laughter.]

We are happy to have you.

STATEMENT OF VERNON M. BRIGGS, JR., PROFESSOR OF LABOR ECONOMICS, INDUSTRIAL AND LABOR RELATIONS INSTITUTE, CORNELL UNIVERSITY

Mr. BRIGGS. Thank you. I will be as brief as I can. The statement is quite long, so I know I have to be brief. So I will try to, anyhow.

Despite both the large size and the critical importance of the rural economy to the Nation's overall welfare, rural human resource problems continue to be, at best, unrecognized and, at worst, neglected. Indicative of this continuing state of affairs is the fact that useful rural labor market data continues to be sparse and often inconsistent. Support for research that focuses exclusively on rural labor market operations is minimal, and the few research insights that are available are usually ignored in the policy formulation process.

Despite the fact that over a quarter of the Nation's population in 1980 resided in rural areas and over a third of its labor force was employed in nonmetropolitan areas in 1982, public policy continues to function as if urban and national labor market issues are synonymous. As a consequence, the unique human resource problems that confront rural America remain largely unaddressed. The pattern of neglect is not new, but there are signs in the 1980's that the human and financial cost of this lack of attention appear to be growing.

The statistical concepts of unemployment and its definition was developed in the 1930's—at the end of the depression and they have continued largely in use since then. During that depression decade, there was a close relationship between unemployment and economic deprivation. Unemployment was pervasive amongst many people of all races and both sexes, and in all regions.

In subsequent years unemployment has fallen from the depression rates and there has been growing concern that the unemployment rate no longer is a satisfactory measure of economic deprivation.

As an aggregate figure, the unemployment rate is a composite of a vast number of diverse individual experiences. A low unemployment rate can mask that fact that subgroups in a population may still be experiencing very high levels of unemployment.

The average figures often conceal more than they reveal. In fact, during the 1960's when the unemployment rate in the late 1960's was as low as it has been in the last 25 years, with rates in the 3.6 range, it was during that period that our Nation's cities erupted into a large number of civil disorders. That experience showed the shortcomings of reliance upon the unemployment rate as an indicator of economic welfare. Its deficiencies became painfully obvious.

The report of the National Advisory Committee on Civil Disorders highlighted the fact that even though the national unemployment rate was low, the unemployment rates among many subgroups in our cities in some areas were extremely high.

And it led to a movement to set up a series of subemployment measures, in other words, ways of finding some other ways of measuring economic deprivation than simply the unemployment rate.

This led to the development of the subemployment index in the Department of Labor, and that subemployment index, which was an effort to combine the working poor—people that have jobs but cannot earn an income at levels that will bring them above poverty levels—involuntary part-time unemployment; statistical undercount, which is very, very severe in the low income population areas; and discouraged workers—all of those who want to work but have quit looking for jobs because they feel none are available.

The results of these studies of the subemployment index, which were all conducted in urban areas were, of course, a shock to the Nation. The average subemployment index was 84 percent at a time when the national unemployment rates were around 8 percent.

The subemployment index was developed in response to a need for a better yardstick to measure the underutilization of the urban labor force following the violent disruptions in many of our Nation's urban slums.

No consideration at that time was given to the application of the concept to rural labor markets. The obvious explanation is that rural workers suffer from an audibility gap. They lack a public voice. Their needs at the time that the subemployment index was developed were probably as severe, if not worse than those of urban workers. But because rural workers are geographically dispersed and because they lack media coverage relative to what is available to urban workers, it is almost impossible for their needs to be articulated and publicized or their frustrations to be manifested in ways that are available to urban workers.

Hence, there was no research or policy effort ever made to include rural workers in the conceptual designs of these subemployment indexes by the Department of Labor.

I go through several other attempts to develop alternative measures by the Bureau of Labor Statistics and by the Department of Labor.

Due to concern that this unemployment data was not useful, the Levitan Commission was set up in 1976 to look at the unemployment statistics, and especially the concept of economic hardship. I won't go through the discussion about why Congress created this Commission.

The Commission ultimately decided not to publish a single hardship index figure by an 8-to-1 vote with Chairman Levitan being the dissenter and arguing that we should have an economic hardship index.

But the Commission did call for the publication by the Bureau of Labor Statistics of an annual report on economic hardship. The Levitan Commission also called for efforts to make the rural population identifiable in Government reports, but in my review of the last two reports by the Bureau of Labor Statistics, three reports actually on economic hardships that have come out, the words "rural" and "nonmetropolitan" don't appear anywhere in any of them.

So that again it is an aggregate concept. The reports are now available showing that there is much more economic hardship in the Nation than is indicated by the unemployment rates, but none of it is broken down to identify the needs of rural areas.

It should also be noted, as Ms. Norwood mentioned briefly in her talk, that as yet there has been no effort at the Federal level to address one additional indicator of underemployment; namely, the case of people that take jobs and therefore are counted as being employed, but the jobs are way below their skill levels or educational levels that they already possess. This usually means they are earning lower wages than they feel they deserve.

This is the meaning of the term underemployment that most people in the citizenry of the Nation have when you raise the concept of underemployment. They don't think of discouraged workers or involuntary part-time workers or statistical undercount or all the things that economists discuss. They usually think in terms of people working below their skill levels.

But because this type of information is not presently part of the Federal labor market statistical system and because it is a concept that is not easily quantifiable, it is simply ignored as an issue.

It is likely in rural areas that this phenomena is far more common than in urban areas. Just because social problems cannot be easily quantified and, therefore, are not examined does not mean that they are unimportant. This issue comes up a little bit later in my prepared statement.

Let me just very briefly highlight some of the results from rural labor market research. There are at least five or six studies, all of which are cited in the statement, that have unequivocally stated that the unemployment rate is absolutely the wrong indicator to measure the utilization of labor and the job adequacy of rural areas.

Senator ARDOR. What page are you on?

Mr. BRIGGS. Under rural labor market research, and the citations are there, Tweeten, Hathaway, Marshall, Nilsen, Martin, Rungeling, and others, with all the specific page recommendations, all of which unequivocally state that the unemployment rate is the wrong indicator. And these are studies that have focused exclusively on rural as opposed to national studies of labor markets that largely are reflecting urban data biases. These are studies that all looked only at the rural labor market, and all of them have unequivocally stated this conclusion.

The reasons follow in the rest of this section of my prepared statement. There is the higher incidence of self-employment, the higher incidence of involuntary part-time employment, the higher incidence of casual labor, of unpaid family labor, multijob holders, migratory and seasonal labor. All of these indicate the need for a broader type of statistical data base to really have an understanding of rural labor markets. They are important for urban areas, too, but they are much more important for rural areas.

Thus, it is not surprising that the rural labor market researchers are in complete agreement that underemployment measures are mandatory for an adequate depiction of nonmetropolitan labor market reality, and I will cite some findings of the National Governors' Association. When the CETA Program was of special interest to them, they were very concerned about the use of unemployment rates because it was a bias against providing services to rural areas for which the Governors were primarily responsible.

I also mention a study done by Ray Marshall, former Secretary of Labor, when he was an academic economist. He made an effort to estimate subemployment in rural areas. Another study, of which I was a part, of the Southeastern part of the United States, calculated a subemployment index for rural counties of 41 percent. The details are discussed in my prepared statement.

One of the problems is also the fact that there is inconsistent definitions between Government agencies, and you touched on this a few moments ago with Ms. Norwood between the Bureau of the Census, between the Department of Labor, between the Department of Health and Human Services.

The Levitan Commission argued in favor of a consistent definition among Government agencies that collect and publish rural and nonmetropolitan data so we could actually carry on a dialog and know who is talking from what data source. But still there is no sign that that recommendation has been acted on yet.

Looking at the post-1980 developments, it included the most serious recession period that the Nation has encountered since the early 1930's in terms of unemployment rate. It looks as though rural America has suffered the worst of all possible fates. Indicative again of some of your introductory comments, normally the experience has been that the unemployment rates of rural America have always been below the national rates. There is some indication here in the 1980's, however, that some of the unemployment rates in rural areas, at least as measured by nonmetropolitan data, are even exceeding those of the urban area.

Senator ABDNOR. I will tell you one thing, in the rural areas, people will take any kind of available job when they need one.

Mr. BRIGGS. Yes.

Senator ABDNOR. I would like to see more people in urban areas of this country take the kind of work they do. Then, if they can't find work and the unemployment rates are high, it is because there is absolutely no work available. Some of the jobs are not desirable and the workers are often turned down. I would just like to make that point.

Mr. BRIGGS. Well, there is a very important study in your neighboring State of Nebraska that I mention in here that touches right on that point.

Let me just say, and it may not be popular to say, but I think aside from the severe problems at agriculture has had in recent years that some of the effects of national economic policy in rural areas have been disastrous for rural America. Under the Budget Reconciliation Act of 1981, as enacted by Congress, the first principle consisted of cutting Federal personal income taxes.

The taxes, however, were proportional to income. Hence, as there were proportionately more people in lower income brackets and few in higher income brackets in most rural areas than in urban areas, the rural economy has received very little benefit from the stimulation as did the urban economy from that type of across-the-board tax reduction.

Second, on the expenditure side, the sharp cuts in social expenditures, because of many of the problems especially of poverty and dependency, have been much more severe in rural areas than in urban areas. The cutbacks in these programs on the expenditure side have meant less money available for rural areas.

Third, the massive buildup in defense areas will only tangentially touch most of rural America. It will help certain urban areas tremendously and a few rural areas, but most of rural America is not going to be affected by this.

There are only a few studies that have touched on this experience so far that I know of. One was done by the Tennessee Valley Authority of its 201 counties in the Southeastern part of the United States. It found, as I touch on in here, that their communities received only 17 percent of the economic stimulation as the national did.

Confronted with this massive recession we had in the early 1980's, their area had very little stimulation. They actually found a number of counties in the Southeastern United States in which the counties were negatively affected by these three components of this economic legislation. They are actually worse off as a result of the

cutback in expenditures, the tax cut which did virtually nothing for many of them, and the emphasis on defense expenditures.

The Southern Regional Council has made almost the same conclusions. If I might, I just wish to cite one study here from Nebraska, a predominately rural State, and in 1985 it just released a study, a statewide survey, in which they wanted to find out whether or not the situation really was worse than it was being reported by the Federal statistics.

They have conducted their own survey, an expanded statewide sample, and used the exact same definitions used by the Bureau of Labor Statistics and found that, while the official unemployment rate in the State was 5.7 percent, their survey rate was 6.1 percent. In other words, their survey rate was higher.

The survey found the unemployment rate of urban workers was 7.3 percent while the rural rate was 5.3, which then meant that the rural rate was lower. The study then found that 12 percent of those employed were involuntary part-time workers, 1.1 percent were discouraged workers who had dropped out, but the most surprising figure in this whole study was that 23 percent of the people who reported themselves employed stated that they were working at jobs that were below their skill levels and education levels. They had taken these jobs only because they were the only jobs they could find, the exact comment you made a moment ago.

Although this report did not give a specific breakdown, it did state that the problem was much worse, that this issue of the downgrading of the labor force, was much more severe in the rural than in the urban areas.

Let me just make a last comment and then I will stop. It can be expected, however, that if underemployment measures are actually developed and if they are included in the formula to allocated Federal funds, and that is discussed in this statement, but I haven't highlighted it, there would be a considerable increase in the assistance provided under most programs to rural areas, and such increases will probably mean decreases elsewhere.

It is likely that there will be immense political opposition to any effort to change the prevailing urban biases that accentuate unemployment as the key allocator, and the National Governors' Association has made that point.

Thus, part of the resistance to the wider adoption of economic hardship measures stems not from the logic or the methodological restraints that we focus so much on, but from the political awareness of what the results might be. Thank you.

[The prepared statement of Mr. Briggs follows:]

PREPARED STATEMENT OF VERNON M. BRIGGS, JR.

The Rural Labor Force: Unemployment and Underemployment Issues

Despite both the large size and the critical importance of the rural economy to the nation's overall welfare, rural human resource problems continue to be either at best unrecognized or at worst neglected. Indicative of this continuing state of affairs is the fact that useful rural labor market data continues to be sparse and often inconsistent. Support for research that focus exclusively on rural labor market operations is minimal and the few research insights that are available are usually ignored in the policy formulation process. Despite the fact that over a quarter of the nation's population in 1980 resided in rural areas and over one-third of its labor force was employed in non-metropolitan areas in 1982, public policy continues to function as if urban and national labor market issues are synonyms. As a consequence, the unique human resource problems that confront rural America remain largely unaddressed. The pattern of neglect is not new. But there are signs in the 1980s that the human and financial costs of this lack of attention appear to be mounting.

THE CONCEPTS OF EMPLOYMENT AND UNEMPLOYMENT

The official definitions of the civilian labor force--those employed plus those unemployed--have not been substantially altered since they were set forth near the end of the Depression (National Commission on Employment and Unemployment Statistics, 1979: 23). The definitions used by the U.S. Bureau of the Census in its monthly Current Population Survey state that employed persons are those civilians more than sixteen years of age who are not institutionally confined and who either work for pay at any time or who work unpaid for at least fifteen hours in a family-operated enterprise during the week in which the monthly sample count is conducted. Those persons who were temporarily absent from regular jobs because of illness, vacation, industrial dispute or similar reason are also counted as being employed. A person with more than one job is counted only in the job at which he or she worked the greatest number of hours. Since January 1983, resident members of the Armed Forces are also included in the national but not the local labor force statistics. Unemployed persons are those civilians above the age of sixteen who are not institutionally confined who did not work at all during the survey week but who claim to be available for work and who searched for a job during the preceding four weeks. The official unemployment rate, therefore, is simply a ratio of the unemployed to the combined number of employed and unemployed. Thus, the definitions used to determine the official unemployment are statistically explicit.

Aside from a few minor suggestions, such as the inclusion of the military in the national statistics, the National Commission on Employment and Unemployment Statistics recommended in 1979 that no changes be made in the current definition of employment. The commission, in a five to four split vote,

specifically rejected a proposal that discouraged workers should be counted as being unemployed (National Commission of Employment and Unemployment Statistics, 1979: 56). As will be discussed subsequently, the continued exclusion of discouraged workers has disproportionately adverse significance to the evaluation of rural labor markets relative to urban labor markets.

THE CONCEPT OF UNDEREMPLOYMENT

During the depression decade of the 1930s, there was a close relationship between unemployment and economic deprivation. Unemployment was pervasive among all regions, races, sexes, and classes. In subsequent years as the unemployment rate has fallen considerably from its Depression heights, there has been growing concern that the unemployment rate no longer is a satisfactory proxy for economic deprivation. As an aggregate figure, the unemployment rate is a composite of the vast amount of diverse individual experiences. Hence, even a low unemployment rate can mask the fact that subgroups in the population may still be experiencing very high levels of unemployment. Average figures often conceal more than they reveal.

Indeed, during the 1960s as the civil rights movement progressed from its initial preoccupation with the social and political indignities of overt segregation in the South to becoming a national movement for equal economic opportunity, the shortcomings of sole reliance upon the unemployment rate became painfully obvious. Unemployment rates during the mid-1960s fell to their lowest levels since World War II. Yet a rash of civil disorders erupted in a number of urban areas throughout the nation. Analysis of the causes of these upheavals centered upon the deterioration of urban black employment opportunities despite opposite national trends (Report of the National Advisory Commission on Civil Disorders, 1968: 251-65). Many of these urban blacks were either migrants from the rural South or children of families who themselves had migrated from the rural South (Fuller 1970). Unemployment rates for blacks were more than twice those of whites and the rates for black women and black youth were even higher. But to make things even worse, labor market experts noted that the economic plight of blacks was also adversely affected by declining male labor force participation rates and by the fact that many fully employed male and female blacks were unable to earn incomes that would bring them above nationally defined poverty levels.

Thus, the stage was set for a departure from sole reliance upon the unemployment rate as the principal determinant of the adequacy of labor markets. In 1966, the U.S. Department of Labor (DOL) launched its "slum survey" in ten large urban areas. No nonmetro areas were included. The study found that in slum areas where minorities were disproportionately concentrated; considerably higher unemployment rates prevailed than in the surrounding metro areas. But the level of analysis was broadened by the introduction of the new concept of a "subemployment" measure (Manpower Report of the President, 1967: 73-75). The details of this measure are discussed elsewhere (see Briggs, 1981: 363-364). Suffice to say for present purposes that the index sought to measure not only "official" unemployment but also to include allowances for the working poor, the involuntary part-time employed, discouraged workers, and even an estimate of statistical undercount which is well known to be a serious problem in all low income areas. The result was that subemployment in these ten urban slum areas was computed to be between 24 percent and 47 percent -- the average was 34 percent.

The subemployment index was developed in response to the need for a better yardstick to measure the utilization of available urban labor, following the violent eruption of a number of the nation's urban slums. No consideration was given at the time to the application of the concept to rural labor markets. The obvious explanation is that rural workers suffer from an "audibility gap." They lack a public voice. Their needs at the time that the subemployment index was conceived were as severe as those of urban workers, if not more so. But because rural workers are geographically dispersed and they lack media coverage (relative to what is available to urban workers), it is almost impossible for their needs to be articulated and publicized or for their frustrations to be manifested in ways that are available to urban workers. Hence, no research or policy effort was made to include rural workers in the conceptual design of the index by DOL. In passing it should be noted that in 1967 the final report of the President's National Advisory Commission on Rural Poverty did make reference to the severity of underemployment in rural areas. Its report, however, did not attempt to measure the magnitude of underemployment or to offer a preferred way to measure its dimensions (President's National Advisory Commission on Rural Poverty, 1967: X).

In 1968, DOL announced that further surveys were underway and suggested that "impoverished rural areas" should also be studied in light of this expanded definitional concept. But with the change in national political leadership and philosophy at the federal level that occurred in late 1968, the official interest in the subject of underemployment concepts was abandoned (Spring: 1972).

In 1972, the staff of the Subcommittee on Employment, Manpower, and Poverty of the Senate Committee on Labor and Public Welfare undertook the task of compiling a subemployment index for fifty-one urban areas (U.S. Senate, 1972: 2276-80). The subcommittee relied, however, not on a sampling technique but rather on the data collected in the 1970 count of the entire population of these low income areas by the census. It found that although the national unemployment rate was between 5 and 6 percent, the unemployment rate in these inner-city areas was 10 percent and the subemployment rate was 30 percent. The subemployment concept was essentially the same as that used in 1967 by DOL. Again, no effort was made to include any rural areas.

Interest among academicians in the subject of an expanded definitional concept remained strong. (see Miller, 1973: 10; Levitz and Taggart, 1973; and Briggs, 1981). In 1973, the passage of the Comprehensive Employment and Training Act (CETA) mandated that DOL develop data that closely resemble those needed to construct a subemployment index. The act also required that funds be allocated on the basis of local labor market data on unemployment--even though no such local labor market data existed at that time (Norwood 1977). The Bureau of Labor Statistics (BLS) of DOL was given the responsibility to develop all such data. In 1975, the commissioner of BLS outlined the extreme difficulty encountered in the collection and tabulation of subemployment data (Shiskin, 1975). Because there was no consensus among policymakers, academicians, and the public, the commissioner requested that an independent and impartial review committee be established to examine the definitional issues involved.

In the meantime, in 1976, BLS announced that it would begin tabulation and publication of seven separate "measures of unemployment." One would be the official defined rate whereas the other six were various measures that were either tighter or looser constructions of labor market conditions (Shiskin, 1976). This useful monthly and quarterly series continues to be available. It is, however, an aggregate tabulation for the nation as a whole with no mention of rural labor market conditions.

Later in 1976, legislation was enacted that established the National Commission on Employment and Unemployment Statistics (Public Law, 1976). This presidential commission of nine nongovernmental persons was charged to examine the need to develop broader labor market concepts. A specific request was made to study the issue of economic hardship. Sar Levitan, was appointed chairman of the new commission.

In its final report, the Levitan Commission did find "that the present system falls short of meeting the information needs of labor market analysts" who are concerned with the usefulness of the data for policy development (National Commission on Employment and Unemployment Statistics, 1979: 38). The report observes that "unemployment rates in rural areas are consistently low relative to urban areas." Taking specific note of the inordinately high incidence of poverty in nonmetro areas and the general scarcity of jobs relative to metro areas, the commission also mentions that the problems of worker discouragement, involuntary part-time employment, and the working poor are especially severe in many nonmetro areas. The commission states that "the diverse circumstances of rural workers and the unique characteristics of rural labor markets" underscore the need for new measures of earnings and income adequacy (National Commission on Employment and Unemployment Statistics, 1979: 97). The commission noted that "economic hardship" may come from low wages among employed persons, unemployment (including partial unemployment due to slack work) among those in the labor force, and limited participation in the labor force by persons who desire more participation. The commission recommended the development of "multiple indicators" of hardship. In its final report, however, the commission rejected the idea of a single composite index of labor market hardship. Such a composite index had been contained in the preliminary draft issued nine months prior to the final report. The decision not to recommend such a single index was based on an eight to one vote with Chairman Levitan casting the single dissent (National Commission on Employment and Unemployment Statistics, 1979: 59-60 and 71-72). The majority of the commission concluded that "the issues associated with defining labor market hardship reveal the inherent complexity and multidimensional nature of the concept." The commission did recommend that distinct indicators corresponding to various types of hardship be developed and published in an annual hardship report that would separately discuss employed persons earning low wages, unemployment, and nonparticipation in the labor force (National Commission on Employment and Unemployment Statistics, 1979: 63-71). In response to this specific recommendation for a special annual hardship report, the BLS has published such reports beginning in 1982 (Bureau of Labor Statistics, 1982, 1983, and 1984).

It is significant that the commission explicitly recognized the lack of useful labor market indicators for measuring the adequacy of employment for rural workers. It discussed the need for better indicators other than simply unemployment. It did recommend "that the rural population be an identifiable population group in indicators of labor market related hardships" (National Commission on Employment and Unemployment Statistics, 1979: 97). Unfortunately but not surprisingly, the aforementioned BLS reports on economic hardship that have been published since 1982 do not include any data breakdown that identifies rural or nonmetropolitan workers as an "identifiable population group." It is likely that many of those persons identified in these reports as being in need are rural workers. But one would never guess that this is the case from reading these reports.

It should also be noted that no federal effort has yet been made to address one additional indicator of underemployment. Namely, the case of persons who take jobs--and are thereby counted as being employed--but the jobs are below the skill levels that many workers already possess. It usually means that they are earning lower wages than they feel they deserve. This is the meaning of the term underemployment that most non-economists usually have in mind when they discuss the underemployment issue. But, because it is not presently part of the federal labor market statistical system and because it is a concept that is not easily quantifiable, it is simply ignored as an issue. It is likely in rural areas that this phenomenon is more common than in urban areas. Just because social problems cannot be easily quantified and, therefore, they are not examined does not mean they are unimportant.

DATA AND PUBLIC POLICY

The unemployment rate has become by far the most important of the economic indicators. It has been referred to as "the most important single statistic published by the federal government" (President's Committee to Appraise Employment and Unemployment Statistics, 1962: 9). Not only has it become the standard for determining the inadequacy of the demand for labor and the slack utilization of the available labor supply, but, especially since the early 1970s, it also has evolved into a role as a primary allocator of federal funds for human resource development policies (Shiskin 1977; Norwood 1977).

Thus, the "official" unemployment rate has become more than simply a subject of academic interest. It has become a topic of practical importance in both the formulation and the implementation of public policy.

Yet since the early 1960s there has been growing concern by some labor economists and by many public officials that the unemployment rate itself is an inadequate indicator for understanding the actual condition of local labor markets. Among the research community that has focused upon rural labor markets, the verdict is overwhelming--if not unanimous--that this standard is especially inadequate for assessing the actual conditions of rural labor markets.

Under the Job Training Partnership Act of 1982, for instance, the formula for the allocation of funds is composed of three equal components. They are: one-third of the money according to each state's relative share of low income persons; one-third according to the state's relative share of unemployed person's above 4.5 percent of the labor force; and one-third according to the state's

relative share of unemployed persons above 6.5 percent of the labor force. The funds provided to the states, however, do not flow directly to the areas of need as they did during the CETA era.

I do not know of any study that has focused specifically upon the effects of the JTPA funding formula or rural labor force problems. It is clear, however, that any formula which bases 2/3 of its funds on unemployment rates is unlikely to be of much benefit to rural areas. Moreover, with respect to JTPA, the overwhelming problem in most rural communities is the need for jobs (Rungeling, et al., 1977). JTPA is conspicuous by its focus on training. By specific design, it eliminated the job creation component that had become a prominent feature of the earlier CETA program. An exclusive focus on training only makes sense in an environment in which jobs are readily available. In most rural communities, this is decidedly not the case. (Briggs, et al., 1984).

THE RELEVANT FINDINGS OF RURAL LABOR MARKET RESEARCH

The evolution of most of the efforts to measure underemployment has had little explicit recognition of rural labor market behavior. Either the concepts were based largely upon urban market studies or upon national data series that are heavily biased toward urban data inputs.

Research that is explicitly concerned with rural labor market operation and the job-seeking behavior of rural workers is very limited relative to that available for urban areas and urban workers. Moreover, the findings of this relatively small body of rural research are not always consistent on all matters. But on one key issue there is singular agreement in the rural labor market literature: the official government unemployment rate is a very poor measure of both underutilization of labor supply and job adequacy in rural areas. (see Tweeten, 1978: 21; Hathaway, 1972: 43; Marshall, 1974: 78; Nilsen, 1979: 31; Martin, 1977: 223; and Rungeling, et al., 1977: 146). Each of these studies were based on research that was explicitly directed at rural labor market operations and rural workers, and each has strongly recommended that some measure of underemployment would be a far more appropriate descriptor. The reasons given for the need for such a measure are complex but they do reflect careful analysis of nonmetro phenomena.

The incidence of self-employment in 1975 was twice as high in nonmetro areas (17.4 percent of the labor force) as it was in metro areas (8.9 percent) (Nilsen, 1979: 11). Of those self-employed in all nonmetro areas, 61.4 percent reported such work was their sole source of earned income. It is farm activity in rural areas that accounts for most of the difference in the degree of self-employment between metro and nonmetro areas. Self-employed persons represent an entirely different group than those who work for wages and salaries. Income from self-employment is subject to greater fluctuations and the earnings derived from such work are often low. Also, as Nilsen has noted, "unlike wage and salary jobs, unemployment from self-employment activities generally requires that the enterprise fails" (Nilsen, 1979: 13).

It is also of consequence that involuntary part-time employment is higher in nonmetro than in metro areas. In 1975, the difference was 4.8 percent to 3.7 percent or almost 30 percent higher (Nilsen, 1979: 17). The main reasons

for this difference are that many rural industries are more sensitive to unfavorable weather conditions and the employment mix in rural areas is disproportionately composed of industries with unstable labor requirements. Hence, the numbers of weeks worked by rural workers is consistently below that of urban workers.

In addition, casual employment, unpaid family labor, multiple-job holders, as well as seasonal and migratory work are all more common in rural areas than in nonrural areas (Tweeten, 1978: 4). As a result nonmetro areas have a much higher proportion of low earnings occupations than do metro areas. The occupational categories of operatives, laborers, and farm occupations are proportionately higher. These three occupations represented 41 percent of all male employment in nonmetro areas as opposed to only 25 percent in metro areas (Nilsen, 1979: 22-25).

With regard to income, median family incomes in rural areas are rising but they remain considerably below those of urban families. The 1980 Census showed that median family income in urban areas was \$20,623 while it was \$17,995 in rural areas and \$16,592 in nonmetropolitan areas. Moreover, the incidence of family poverty was 9.2 percent in urban areas but 10.6 percent in rural areas and 12.0 in nonmetropolitan areas. Yet, participation in social programs (e.g., unemployment insurance coverage, minimum wage coverage, and disability insurance) for needy persons, however, is lower in nonmetro areas than in metro areas (Tweeten, 1978: 5).

The fact that the population is geographically dispersed in nonmetro areas adds to the difficulty of providing labor market information and of delivering employment assistance services. Likewise, the general scarcity of employment alternatives in nonmetro areas often leads to shorter job search activity.

As a result of these uniquely nonmetro labor market characteristics, the available research is uniform in its findings. The statistical representation of unemployment is actually lower than the real number of persons wanting jobs. Many persons who are involuntarily employed part time are counted as being fully employed. Labor force participation rates for both men and women are lower in nonmetro than metro areas. (Tweeten, 1978: 3-4). The explanation is partly due to differences in the respective age profiles of the sectors and partly because workers become more easily discouraged from actively seeking jobs. There are considerably fewer job alternatives available in rural areas and low wages dampen the enthusiasm for prolonged searches (Rungeling et al., 1975). The lower wage levels, the presence of fewer capital intensive industries, the seasonal employment opportunities, and the reduced access to income assistance programs all contribute to the fact that the working poor are proportionately more numerous in nonmetro than metro areas.

Thus, it is not surprising that rural labor market researchers are in complete agreement that underemployment measures are mandatory for an adequate depiction of nonmetro labor market reality. These conclusions were recognized by the National Governors Association (NGA) during the time that state governors had a primary responsibility for implementing the human resource programs in rural areas under the Comprehensive Employment and Training Act that was in effect from 1974 to 1982. NGA strongly criticized the use of unemployment rates as a basis for fund allocations and it sought to have some form of

subemployment formula substituted in its place (National Governors Association, 1979: 43-104). The NGA, was also very concerned that so little research has actually been done on the critical problems of the working poor and discouraged workers in nonmetro areas, and that the economic profession has been unable to develop a measure of underemployment that can be disaggregated to nonmetro labor markets (National Governors Association, 1979: 48-49).

One crude effort was made by Marshall to construct a subemployment index for the aggregate nonmetro economy in 1970 (Marshall, 1974: 80-81). The result was that the nonmetro subemployment rate for men was 25 percent and for women 17.3 percent. The subemployment rate for men was 6.1 times greater than their unemployment rate; for women it was 3.0 times greater. The major limitation of Marshall's work was that it is based entirely on the use of secondary data--that is, census data.

Only one study of nonmetro labor markets has attempted to compute a subemployment index that was drawn from a primary household survey (Rungeling et al., 1977). The strength of this study is that it was based on 3,422 interviews that were randomly selected from the population of four geographically separated southern nonmetro counties. The questionnaire was able to probe more deeply into participation and nonparticipation than has any other source of labor market information currently available (including census reports). It was possible to identify precisely who was involuntarily employed part time, who were discouraged workers, and who were the working poor. This information was compiled and used to prepare a subemployment index that was constructed with exactly the same standards used by Levitan and Taggart (Levitan and Taggart, 1973) in a national study. The result was that although Levitan and Taggart found a subemployment index of 11.5 percent for the nation in 1972, Rungeling et al., found a rate of 41.0 percent for the combined four nonmetro counties for roughly the same time period.

The limitation of the Rungeling et al., study, however, is that the four nonmetro counties (one each in Georgia, Louisiana, Mississippi and Texas) were all from the South. Moreover, the counties were preselected partly because of their known high incidence of poverty. But the authors do contend that "each [county] is roughly representative of large segments of the rural South" (Rungeling et al., 1977: 12). Nonetheless, the subemployment rate of 41.0 percent is certainly extreme as a depiction of the total nonmetro economy of the nation (and, perhaps, of the total nonmetro South). The study, however, did reveal numerous ways in which nonmetro labor markets are distinguishably different from metro labor markets. For instance, the official unemployment rate for the four counties, computed from the interviews, was only 2.7 percent. But the combined labor force participation rate of the counties was an incredibly low 42.3 percent (the comparable national rate was 61.8 percent in 1972). In standard labor market analysis, low unemployment rates are usually accompanied by higher than average (not lower than average) labor force participation. The study was able to identify exactly why the labor force participation was so low. It found that the unemployment rate would have been 11 percent higher if discouraged workers were included and another 8 percent higher if those working involuntarily on a part-time basis were included (Briggs et al., 1977: 228). Also, whereas 43.1 percent of the households surveyed were living in poverty, fully 34 percent of those poverty households had a head who was employed full time. Thus, there were many nonmetro workers who were poor despite the fact that they were regularly employed. Notwithstanding the limitations of the study, the magnitude of the revealed problems accentuates the necessity of a more realistic measure of labor utilization than mere reliance upon the standard definition of unemployment.

THE DATA BARRIER TO EFFECTIVE RESEARCH

To collect primary data is a costly undertaking. It is not surprising, therefore, that most of the limited amount of available research is based upon secondary data. But the use of secondary data sources is often confusing. One of the factors that has retarded research in nonmetro labor market operations and has hampered the formulation of effective public remedies for nonmetro human resource problems has been the lack of a consistent definition of the term "nonmetro."

The Bureau of the Census has two separate data series that are most commonly used to define the rural population. One, used in the Current Population Survey, includes in the metro population all persons living in a Standard Metropolitan Statistical Area (SMSA) of 50,000 persons or more; those living in the county in which an SMSA is located; and those counties tied to an SMSA by daily communication links. The nonmetro population includes those people living in the counties that remain. The Census Bureau, in its decennial count of the population, however, uses a definition of the rural population that defines rural persons as those living in open country as well as small towns of less than 2,500 persons, unless inside the urban fringe of metropolitan areas. "Rural" and "nonmetro" are sometimes used interchangeably. This is misleading because the land areas classified as nonmetro greatly exceed the areas classified as rural. Moreover, it is estimated that about 30 percent of those classified as "rural" reside in open areas within the boundaries of metro areas.

The U.S. Department of Labor, in turn, defines as rural counties those in which a majority of the people live in places with populations less than 2,500. Because the definition includes people living in places with more than 2,500, the DOL definition is more inclusive than is the definition of the Census Bureau.

The nonmetro definition of rural is often used by the U.S. Department of Health and Human Services in its rural programs. In addition, there are other definitions used by the U.S. Department of Agriculture (some of its programs define as rural areas the open country plus places with population of 10,000 or less). All of these are "official" definitions of one government agency or another. Until the population is uniformly defined, it is very difficult to address the derivative labor market data problems in an unambiguous manner from secondary data sources.

Aware of this problem, the Levitan Commission argued in favor of a consistent definition among government agencies that collect and publish data--rural and non-metropolitan labor market data. To date, there is no sign that this recommendation has been enacted.

POST-1980 DEVELOPMENTS

Ironically, the serious recession that the U.S. economy encountered in the early 1980s--the most severe in terms of levels of unemployment since the 1930s--caused rural America to encounter the worst of all possible situations. Not only did the problems of underemployment continue but the aggregate unemployment rates for nonmetropolitan areas actually exceeded those of the metropolitan sector. In 1982--the worst year in this recession period with a national unemployment rate of 9.7 percent--the unemployment rate

for metropolitan areas was 9.3 percent but for nonmetropolitan areas it was 11.0 percent (Daberkow and Bluestone, 1984: 18). All indications are that as unemployment has receded somewhat, the disparity has remained. Although it is too early to be certain, it appears that the rural population growth of the 1970s may have ended and that this vital sector may be heading into a period of actual decline or stagnation (Sinclair, 1985).

One of the obvious factors contributing to the problem of rural America in the 1980s has to do with agricultural issues. The farm economy has been adversely affected by the overvaluation of the dollar which has made it difficult to export. Many farmers had been encouraged to increase productive capacity in the 1970s to meet world demand and, as a result of the rising dollar, these markets have dwindled. Obviously, there are also other factors such as high interest rates and continued advances in technological procedures and methods that enhance productivity and output. But whatever the combination of causes, the results are clear. The decline of agricultural markets means that there is less demand for agricultural implements and supplies and there are declining expenditures in some rural communities for the full range of consumer products. The result is too often a "domino effect" where by agricultural problems spillover into the non-farm economy. Businesses close, jobs are lost, and the quality of life is diminished.

But, aside from the problems of agriculture which may or may not be transitory in nature, the national economic policy of the 1980s can only be described as being disastrous for rural America. Beginning with the Budget Reconciliation Act of 1981, the cornerstones of national economic policy were laid. The Reagan Administration program, as enacted by Congress, has consisted of three principle elements. The first principle consisted of a 25 percent cut in federal personal income taxes. The tax cuts however, were proportional to income. Hence, as there were proportionally more people in lower income brackets and fewer people with higher income brackets in most rural areas than in urban areas, the rural economy received substantially less in terms of stimulation than did the urban economy. Secondly, on the expenditure side, there was a sharp reductions in expenditures for social programs. Although people in rural areas have had greater difficulty qualifying for many social programs, the disproportionately larger size of the low income population of rural areas means that these communities were more affected by cutbacks than were most urban areas. Thirdly, also on the expenditure side, there has been the massive buildup in defense expenditures. Undoubtedly some of the additional defense spending will go into a few rural areas, but most of rural America will not be touched. Consequently, the combined effects of these major national policy initiatives of the early 1980s have, at best, meant that most rural communities have benefitted only marginally or have not been helped at all. It is also likely that some rural communities have actually been harmed by the combined effects of these undertakings. Despite the massive scale of these fiscal policy undertakings, little research has been conducted on the impact of these initiatives on the rural sector.

One regional study, however, was done by the Tennessee Valley Authority (TVA). TVA has a service area that includes 201 counties that are either in its watershed or that use its electric power. These counties are located in all or parts of seven states and they are overwhelming rural. The TVA study found that, collectively, the counties in its vast service area received only

17 percent of the economic stimulation received by the nation from this over-all package and it found that a number of areas had actually been negatively affected (Office of Chief Economist of TVA, 1983: S7-8).

The Southern Regional Council has also issued a report that claims that the dramatic increase in poverty (an increase of 2.5 million people from 1979 to 1983) in its eleven state region is largely attributable to the sharp cutbacks in eligibility for social program by the federal government (Scmidt, 1985). It appears that it was the people in the rural areas of the South who were the most affected by these cutbacks. The study shows that 36 percent of the 4 million people nationwide who lost eligibility for coverage were from the South.

In 1985, the State of Nebraska--a predominately rural state--released the results of a special statewide survey it conducted to examine the accuracy and adequacy of official measures of employment and unemployment as well as the extent of underemployment in the state (Nebraska Department of Economic Development, 1985). Based upon its own survey instrument, an expanded statewide sample, and the use of the same labor market definition used by BLS, it found that while the official unemployment rate for the state for March 1985 was 5.7 percent, the survey rate was 6.1 percent. The survey found the unemployment rate of urban workers to be 7.3 percent while the rate for rural workers was 5.3 percent. The study also found that 12 percent of those employed were involuntarily working part-time jobs; 1.1 percent of the respondents were discouraged workers who had dropped out of the labor force; and, the most surprising result of all was that 23 percent of those employed reported that they were working in jobs below their skill levels and had taken the jobs they had only because they were all they could find. Although the report did not give a specific breakdown of rural versus nonrural experiences on these indications, it did note that issue of working below one's skill levels was more predominate in non-metropolitan areas.

There is, of course, no existing measurement in the federal statistical system that purports to measure whether people are working at or below their existing skill levels. In the Nebraska study, the answers were simply the tabulated responses that the interviewees gave. Hence, even though the responses to this particular question were randomly received, they have to be taken with a grain of salt. Nonetheless, the fact that more than one of every five Nebraskans felt he or she was working (and being paid) at a job below their capabilities is a serious social comment on job satisfaction. If actually valid, the phenomena may at least offer a clue as to why unemployment rates are low in most rural areas. Workers are simply being downgraded to lower skilled jobs and are just taking whatever jobs they can find. Also it implies that those once employed at the bottom are forced out of the labor market into the ranks of the discouraged workers.

Obviously, these reports are piecemeal. The uncertainty about what is happening to the rural labor force in the 1980s only serves again to emphasize the chronic need for the development of an on-going research strategy to monitor labor market developments in rural America. During the 1970s, the Office of Research and Development in the Employment and Training Administration of the U.S. Department sponsored much of the research that identified many of the critical needs of rural workers and assessed the impact of various public policy initiatives on rural labor markets (Robson, 1984). Since 1981, however, this office has been disseminated by "penny-wise, pound-foolish" budget cuts. The vacuum that has been created is immense. It is a mission that desperately needs to be reinstated.

CONCLUDING OBSERVATIONS

The research literature on rural labor markets is extremely limited. As a result, the major conceptual measures used for policy formulations have assumed statistical definitions that appear to have little real relevance to the non-metro economy. Specifically, the unemployment rate has become the standard barometer of labor utilization at the national, regional, and local level. Although the available research from primary data is sparse and that from secondary data is limited, the singular conclusion that underemployment is a far more prevalent issue in nonmetro areas is sufficient to warrant acceptance until other studies can prove otherwise.

The need to establish a firm commitment to rural labor market research is too obvious to be belabored. All of the major issues confronting the urban economy--shifting industrial patterns; changing demographic characteristics of the labor supply; growing abuse of the nation's immigration system; increasing foreign competition; and accelerating changes in the rate of technological change on both the production of goods and services and on the preparation of workers for jobs; and the growing unwillingness of the federal government to accept responsibility for the protection of workers from the harsh and cumulative effects of these happenings--are also buffeting the rural economy. But given the marked differences that exist between the two sectors, it is certain that they have not been affected in the same manner or degree. The burden has fallen heavier on the rural economy. An on-going research program for rural economic developments could provide the information needed to develop policy options.

It can be expected, however, that if underemployment measures are actually developed and if they are included in formulas that allocate funds for federal programs, there would be a considerable increase in assistance provided under most programs to rural areas. As such increases will probably mean decreases elsewhere, it is likely that there will be immense political opposition to any effort to change the prevailing urban bias that accentuates unemployment as the key allocator (National Governors Association, 1979: 86-87). Thus, part of the resistance to the wider adoption of economic hardship measures stems not from logic or methodological restraints but from political awareness of what the results might be.

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Senator ABDNOR. Thank you, Mr. Briggs, for your excellent comments. We have a lot to talk about here, and a lot of thoughts are flowing through my mind. But I guess we had better continue. We haven't heard from Mr. Pulver yet.

I do want to tell you that your entire prepared statements are going to be made a part of the record.

Our last witness, and one that we are anxious to hear from, is Glen Pulver. Mr. Pulver is from an area that is close by where I come from, the University of Wisconsin. He is a professor of agricultural economics.

Mr. Pulver, welcome to Washington and our subcommittee.

STATEMENT OF GLEN C. PULVER, PROFESSOR, DEPARTMENT OF AGRICULTURAL ECONOMICS, UNIVERSITY OF WISCONSIN, MADISON

Mr. PULVER. Thank you very much, sir.

My field of speciality in the department of agricultural economics is in community economic development. A major portion of my time is spent in educational programs directly with industrial development representatives, business leaders, governmental officials, bankers, educators, and others concerned with economic development policy at the local level.

Community leaders throughout the United States have a growing interest in increasing income and employment in their city, village, or town. Although the private sector has the primary role for job generation in the U.S. market economy, local leaders, both private and public, can play a significant part in creating a growth stimulating economic environment. In order to establish a comprehensive community economic development strategy appropriate to their specific goals and conditions, they must carefully analyze the structure of their local economy, uncover its weaknesses and strengths, identify their development options and then act. This requires timely employment, income establishment, sales and capital market data specific to their community.

Three years ago, the University of Wisconsin Cooperative Extension Service committed itself to an expanded educational program in community economic analysis. This effort consists of a series of intensive educational meetings on a community-by-community basis. In these efforts community leaders, planners, and educators are heavily reliant upon secondary data sources as the base of information for their efforts. Although more current, detailed and individualized data gathered by primary means are more valuable in policymaking, matters of time and cost frequently prevent their acquisition and use.

Smaller communities face three fundamental problems when compared with their larger counterparts. First, there is little secondary data from which to draw; second, they seldom have the necessary data gathering structure in place or at their immediate disposal; and, third, the cost per unit of data gathered is relatively high. The first problem, the lack of quality secondary data, may in part be solvable. I wish to focus most of my discussion on this topic.

There are a number of useful secondary data sets provided by the U.S. Government on employment, establishments, sales and income, and these data sets suffer some common problems.

One, infrequency. The most useful data set for studying local retail sales and market capture is the census of retail trade. Unfortunately, it is published only once every 5 years. The report for 1982 sales in Wisconsin became available in the fall of 1984. Many changes can occur over a 5- to 7-year period. Local leaders were obviously reluctant during most of the 1980-84 period to use 1977 sales data. At the same time, most State governments in the United States gather detailed information on retail sales often by community as a part of their State sales tax operations. Some cooperative agreement might be reached between State and national governments to make current sales information available throughout the United States.

Two, reporting units. Many national data sets are reported at the county level or for the standard metropolitan statistical area. These data are useful for community leaders in larger urban areas where a city may represent the near economic totality of the county or SMSA, but are of little or no practical value in local development considerations in more rural areas.

Although county governments have an important economic development role, most effective initiatives emanate from the city, village, or town. The county data are simply not specific enough to be useful at the community level. Absent secondary data, local leaders either make policy decisions without proper information or take the time and raise the funds to gather primary data. Even then they have little use for comparative data.

Many State job service offices gather detailed employment data at the municipal level for unemployment compensation or other purposes. Once again, this data is already gathered on a regular basis which with proper consideration could be made available at little or no additional cost. It is recognized that it would mean some modification to account for the lack of self-employment or proprietary reporting.

Third, data deletion. There is a deep concern for individual privacy in most existing secondary data sets. As a consequence, large portions of information are deleted from reports of sales and employment. In those cases where there is a limited number of establishments, little knowledge is gained from the reports. For example, employment numbers may be deleted from a large employer in a rural county if it is the only business of a specific kind. Retail sales are not reported in any sales category for communities with fewer than 2,500 people and are deleted in many retail sectors in communities with populations between 2,500 and 10,000. As a consequence, the policymakers and analysts are left with empty or partial data sets.

The examination of which data might be made available without damage to the market system and individual privacy would be useful. Researchers and Government employees are experienced in dealing with matters of confidentiality in many sensitive information areas. A great deal of very useful data could be made available with more appropriate nondisclosure provisions.

Fourth, goods producing bias. A great deal of public information is available regarding the manufacturing, agricultural, construction, and mining sectors of our economy. There has been little detailed analysis of the service producing sector, for example, trade, finance, insurance, health care, education, et cetera, although this sector has been the dominant source of employment growth in the United States for more than 60 years, not much public information of use in identifying appropriate local policy initiatives has been shared. Once again necessary employment, income and sales data are already being gathered, and a greater investment in analysis and publication would be useful. Larger cities have the staffs to do so, and smaller communities, once again, are at a disadvantage.

Fifth is the lack of reporting. Some critical pieces of information are gathered by the Government, but not reported in a useful form. Capital market data is a good example. Nearly all community economic developers are convinced that efficient capital markets are a prerequisite to income and employment growth.

Small businesses everywhere in the United States are heavily dependent on local financial institution support for both public and private development initiatives. Communities need a clear assessment of their local financial institution's efforts and public reports to the city, village, and town level, of general lending, deposit and asset information, secondary market participation, Government guarantee involvement, shared investments, financial counseling and other critical activities would be useful to local leaders in evaluating capital market efficiencies.

In summary, most of the necessary data for effective community economic analysis is currently gathered either by the State or national agencies, but is often not available, especially in rural areas. Problems of reporting frequency, large reporting units, data deletion, a goods producing bias and a lack of reporting in specific areas plague local leaders and analysts.

A major portion of the problems could be solved by joint utilization of data gathered regularly, by State and national agencies, more appropriate policy regarding public disclosure of confidential information, greater attention to the major job generating service producing sector and a commitment to reporting information of direct use to local leaders connected with the economic well-being of their community, State, and Nation. Thank you very much.

[The prepared statement of Mr. Pulver follows:]

PREPARED STATEMENT OF GLEN C. FULVER

I am Dr. Glen C. Fulver, Professor in the Department of Agricultural Economics of the University of Wisconsin-Madison. My field of specialty is Community Economic Development. A major portion of my time is spent in educational programs directly with industrial development representatives, business leaders, governmental officials, bankers, educators, and others concerned with economic development policy at the community level. I also do research on development policy with a special emphasis on employment potential of service-producing industry and capital adequacy in rural areas.

It is clear that in the United States, the primary responsibility for the generation of increased employment and income lies with the private sector. In recent years, the heaviest burden for job generation has fallen on smaller firms, either newly started or expanding. The service-producing sector has provided the lion's share of this employment growth. It is up to the public governments at the local, state and national levels to establish an economic climate which is conducive to that private growth and at the same time represents the people's interest in issues of equity and natural resource environment.

In recent years, community leaders throughout Wisconsin and most other states of the U.S. have expressed a deep concern regarding the loss of employment to other parts of the world, high unemployment rates, and declining relative incomes which strike hardest in specific geographic areas and with selected population groups. They are increasingly interested in doing those kinds of things which offer the best prospects for job and income improvement locally.

Their options are few but their actions critical. They can do those things which: (1) help existing businesses grow; (2) assist local entrepreneurs in getting started; (3) attract basic employers from other areas; (4) capture dollars which are already in the community and from tourists, and (5) acquire funding from broader units of government. The primary initiative for economic growth remains in the private sector, but the behavior of local, state, and national officials is critical to the success or failure of any community. Examples of specific community initiatives include sponsoring educational efforts on how to start a business, improving public and quasi-public infrastructure such as water systems or local telephone communications, organizing area tourism promotions, developing public-private financing partnerships for civic facilities or housing.

Actions by community leaders, both public and private, which offer the highest probability of increasing local employment and income usually involve some combination of the five options. In short, economic improvement requires

a comprehensive community economic development policy. The proper identification of those specific strategies most likely to prove successful in goal attainment requires careful community economic analysis. Just as in private firms, community leaders interested in nurturing development must be acutely aware of the economic environment which surrounds them, the elements of their income generating units, the relative productivity of specific sectors, the opportunities for exploitation, and the array of policy options available.

Three years ago, the University of Wisconsin Cooperative Extension Service committed itself to an expanded educational program in Community Economic Analysis. This effort consists of a series of four intensive educational meetings on a community-by-community basis. In each community a group of 15-20 local leaders—including representatives of Chambers of Commerce; industrial development corporations; businesses; bankers; city, village, or town government; education and other interested groups—are brought together by County Community Resource Development Extension Agents. Campus specialists like myself lead them through discussions of changing international, national, state and local industrial structure, detailed analysis of local economic productivity including comparisons with similar communities, an examination of specific development options, and a review of their community economic preparedness. At the last of the four meetings aid is given the local leaders in developing a set of action priorities and plans including action responsibility. The Community Resource Development Agent

continues to work with the community leaders for months after the meeting to help make the plan a reality.

A vital element in Community Economic Analysis is the availability of data specific to the city, village, or town being studied. Regional scientists and economists have created a series of useful analytical tools which perform many of the same roles in community policy guidance as those available to business managers. These include: (1) trade area capture, pull factor, and market share analysis which are useful in identifying a community's success in capturing its retail trade potential; (2) location quotients, population-employment ratios, and threshold analysis which aid in identifying the potential of specific industries; and (3) shift-share analysis which provides a measure of the relative productivity of existing businesses, to name a few. With financial help from the North Central Regional Center for Rural Development, the University of Wisconsin-Madison has developed a specific manual describing these tools and their use: Community Economic Analysis: A How to Manual. A supportive computer program covering most of these tools has been developed for use with microcomputers.

Careful community economic analysis can provide important insights to local leaders on which actions, both public and private, offer the best hope for positive change. For instance, retail trade analysis which indicates a relatively low market share captured in a specific commercial sector might direct limited public resources to consumer surveys, preliminary market feasibility analysis and/or contacts with appropriate outside firms for

expansion consideration. Likewise, relatively low employment in a specific industry when compared with similar economic environments might lead to the development of supportive infrastructure and more effective industrial targeting information programs.

Community leaders, planners, and educators are heavily reliant upon secondary data sources as the base of information for their efforts. Although more current, detailed, and individualized data gathered by primary means are more valuable in policy making, matters of time and cost frequently prevent their acquisition and use. Smaller communities face three fundamental problems when compared with their larger counterparts. First, there is little secondary data from which to draw. Second, they seldom have the necessary data gathering structure in place, or at their immediate disposal. Third, the cost per unit of data gathered is relatively high. The first problem, the lack of quality secondary data, may in part be solvable. I wish to focus the remainder of my discussion on this topic.

All of the meetings, analytical tools, and computer programs are of limited use without complete, accurate, and up-to-date information on which to base local decisions. That is where the "rub" comes. Data sets are generally quite available in highly urbanized situations, but nearly nonexistent in rural areas.

The fundamental data required for effective community economic analysis include a record for every city, village and town describing: (1) retail sales at least to the two-digit SIC level and preferably to the three-digit level;

(2) employment to the three-digit SIC level; (3) the number of establishments to the three-digit level; and (4) estimates of sources of personal income at least to the two-digit industrial level plus that from transfer payments and dividends, interest, and rent. It would be helpful if these data were on at least an every-other-year basis. A manager of a private business would never accept these time lags, but community policy makers are forced to use worse data or none at all.

There are a number of useful secondary data sets provided by the United States Government on employment, establishments, sales, and income. These include the Census of Retail Sales, County Business Patterns, Bureau of Economic Analysis personal income sources, and Bureau of Labor Statistics employment projections. Employment data which is community and industry specific is also gathered by State Job Service offices. These data sets suffer some common problems, particularly from the standpoint of rural communities. The problems listed below are not in any order of importance.

1. Infrequency. The most useful data set for studying local retail sales and market capture is the Census of Retail Trade. Unfortunately, it is published only once every five years. The report for 1982 sales in Wisconsin became available in the fall of 1984. Many changes can occur over a five- to seven-year period. Local leaders were obviously reluctant during most of the 1980-84 period to use 1977 sales data. At the same time, most State Governments in the United States gather detailed information on retail sales, often by community, as a part of their state sales tax operations. In Iowa,

this information is available on an annual basis and in great demand by both the public and private sector at the local level. Some cooperative agreement might be reached between state and national governments to make similar information available throughout the U.S.

2. Reporting Units. Many national data sets are reported at the county level or for the standard metropolitan statistical area (SMSA). These data are useful for community leaders in larger urban areas where a city may represent the near economic totality of the county or SMSA, but are of little or no practical value in local development considerations in more rural areas. Although county governments have an important economic development role, most effective initiatives emanate from the city, village, or town. County data are simply not specific enough to be useful at the community level. Absent secondary data, local leaders either make policy decisions without proper information or take the time and raise the funds to gather primary data. Even then they have little useful comparative data. Many State Job Service offices gather detailed employment data at the municipal level for unemployment compensation purposes. Once again, this is data already gathered on a regular basis which, with proper coordination, could be made available at little or no additional cost. It is recognized that it would need some modification to account for the lack of self-employment or proprietor reporting.

3. Data Deletion. There is a deep concern for individual privacy in most existing secondary data sets. As a consequence large portions of information

are deleted from reports of sales and employment. In those cases where there is a limited number of establishments little knowledge is gained from the reports. For example, employment numbers may be deleted from a large employer in a rural county if it is the only business of a specific kind. Retail sales are not reported in any sales category for communities with fewer than 2,500 people and are deleted in many retail sectors in communities with populations between 2,500 and 10,000. As a consequence, policy makers and analysts are left with empty or partial data sets. The careful examination of which data might be made available without damage to the market system and individual privacy would be useful. Researchers and government employees are experienced in dealing with matters of confidentiality in many sensitive information areas (i.e. tax reporting). A great deal of very useful data could be made available with more appropriate nondisclosure provisions.

4. Goods-Producing Bias. A great deal of public information is available regarding the manufacturing, agriculture, construction and mining sectors of our economy. There has been little detailed analysis of the service-producing sector (e.g. trade, finance, insurance, health care, education, communication, business services). Although this sector has been the dominant source of employment growth in the U.S. for more than 60 years, not much public information of use in identifying appropriate local policy initiatives has been shared. Once again, necessary employment, income, and sales data are already being gathered. Greater investment in analysis and publication would be useful. Larger cities have the staff to do so and are. Smaller communities are at a disadvantage.

5. Lack of Reporting. Some critical pieces of information are gathered by the government, but not reported in a useful form. Capital market data is a good example. Nearly all community economic developers are convinced that efficient capital markets are a prerequisite to income and employment growth. Small businesses everywhere in the U.S. are heavily dependent on local financial institution support of both public and private development initiatives. Communities need a clear assessment of their local financial institutions' efforts. Public reports at the city, village and/or town level of general lending, deposit, and asset information; secondary market participation; government guarantee involvement; shared investments; financial counseling; and other critical activities would be useful to local leaders in evaluating capital market efficiencies.

Summary

In summary, community leaders throughout the United States have a growing interest in increasing income and employment in their city, village, or town. Although the private sector has the primary role for job generation in the U.S. market economy, local leaders, both private and public, can play a significant part in creating a growth-stimulating economic environment. In order to establish a comprehensive community economic development strategy appropriate to their specific goals and conditions, they must carefully analyze the structure of their local economy, uncover its weaknesses and strengths, identify their development options, and then act. This requires timely employment, income, establishment, sales, and capital market data specific to their community.

Most of the necessary data is currently gathered either by state or national agencies but is often not available, especially in rural areas. Problems of reporting frequency, large reporting units, data deletion, a goods-producing bias, and a lack of reporting in specific areas plague the users (local leaders, analysts). A major portion of the problems could be solved by joint utilization of data gathered regularly by state and national agencies; more appropriate policy regarding public disclosure of confidential information; greater attention to the major job-generating service-producing sector; and a commitment to reporting information of direct use to local leaders concerned with economic well-being of their community, state and nation.

Senator ABDNOR. Thank you, Mr. Pulver.

I have to say that I think all three of you gentlemen have confirmed my major concerns that we are not always getting a very accurate picture of what is transpiring out in rural America. That is how we got the title "the forgotten economy" for rural America. Personally, I feel strongly that it has been forgotten.

I gather, Mr. Pulver, you feel that we are not utilizing the kind of information that could be made available.

Mr. Briggs, I was kind of curious and anxious to know what you think would be a right measurement if you think we are using the wrong measurement. If the unemployment rate is the wrong measurement for the rural labor force, what would you see as the right measurement to get the right information?

Mr. BRIGGS. Well, when Congress set up the Levitan Commission, one of its mandates was to look into the question of economic hardship and whether or not we should not have an economic index on economic hardship. The Commission, after rangling, issued a preliminary report in which it discussed an economic hardship index, but in its final report voted not to do so, and then explained the reasons as largely methodological problems. They said we are not yet at the state in which we can get the data available and we don't know what to do about some of the subjective features—the discouraged workers issue and things of this kind. They sort of backed off on it.

Chairman Levitan, of course, was the person who still voted for the hardship index and he urged that we should begin to collect that data.

About 3 years after the Levitan Commission's report, Robert Taggart published a whole book on economic hardship showing that it could be done, and he did it, but it was not broken down by rural areas. It was simply overall economic hardship, which is an index that includes estimates of the working poor, estimates of discour-

aged workers, of involuntary part-time unemployment and these types of things brought into one index.

See, the problem with unemployment rates is not just some of the things that are discussed here. The wife of the General Motors president who may make \$8 million, if his wife can't find a job, she is counted as unemployed and therefore as matters now stand that is generally seen as a concern for hardship. On the other hand, you may have a person working in South Dakota for 40 hours a week and not be able to make, because he can't work 52 weeks a year, may not be able to get his family up above the poverty level. Yet, he is counted as employed and he is considered to be no problem, see.

So that what the economic hardship approach does is simply to say that we ought to relate unemployment to earnings and we ought to take into consideration some of these other phenomena as well as discouraged workers, involuntary part-time workers and these types of things.

The things that Congress at least asked the Commission to look into. The Commission's report discusses it in detail, but then ultimately it voted not to do it at this time. It then recommended that BLS publish a hardship report every year, which it now does, but the report doesn't say anything about rural areas. I mean it tells Congress that here is the economic hardship and what the situation is in the United States as a whole, but when you use labor market data for the whole, since the urban economy is bigger than the rural economy, there is a tendency for the urban findings to bias what the results are. The economic hardship doesn't look quite as bad as it is, I think, if you were to focus simply on a rural measure of economic hardship—if you were to break it down, for example, into urban and rural areas.

I would like to see that distinction made, and I think it could be done, but it is not being done now.

Senator ABDNOR. I don't think anyone would quarrel with what you said. As a matter of fact, many of the programs that have been designed here in Congress over the last number of years have certainly been biased toward the urban areas. I wouldn't even be able to put an estimate on how shortchanged rural America is.

Have you got any thoughts on that? I look at the UDAG grants and the like—

Mr. BRIGGS. Well the National Governors' Association, as I say, they have turned around a little bit now with the Job Training Partnership Act. They now have responsibility for a lot of things that are happening in urban areas, too. But during the 1970's, when they had responsibility for the CETA program—that is they had responsibility for what was called the balance of state, they were concerned with the administration of all the human resource programs in the rural areas, and the urban areas were their own prime sponsors and they got their money funded directly from Washington by unemployment rates largely, the National Governors' Association, which was then supposedly the voice of rural America, was unequivocal in its statements that the unemployment rate is the wrong indicator and they were being shortchanged. And I think that has been true across the board of all

human resources programs that rely only on the unemployment rate to allocate money.

The Job Training Partnership Act, two-thirds of that funding is done on the basis of unemployment rates and one-third on the number of low-income persons in the population.

Unfortunately though under the Job Training Partnership Act there is no requirement that the money be spent where the problems are. It just comes to a State. At least under CETA it had to go to specific areas where the problems were, and now there is no guarantee, unless you have a strong rural voice on those State councils, that rural areas are going to get any type of service under this program, and, of course, the level of support under the Job Training Partnership Act is much lower than it was.

I think one of the examples of what may be a little bit of criticism of Congress on this point is that what the research has shown overwhelmingly is that the rural labor market is in desperate need for jobs. The focus of the Job Training Partnership Act did away with all the job creation programs and focused largely on training. Well, training presumes that there are jobs for people to hold, and there has got to be, I think, some emphasis in a lot of our social programs on job creation and job generation in the private and also the public sector.

Senator ARDNOR. Well, they haven't been doing bad. I read a report that showed 350,000 jobs a month are being created. We need to get these people trained for those kind of jobs. You can have jobs but you have got to have people qualified to hold them. It does work both ways.

Mr. Coltrane, you deal with the Economic Research Service. Do you find many shortcomings? You did say it was inadequate I think, our reporting service, did you not in your statement?

Mr. COLTRANE. Sir?

Senator ARDNOR. In your statement, you also agreed that there are really some shortcomings?

Mr. COLTRANE. Yes; I might just add to what Mr. Briggs has said about the shortcomings in some of the data definitions, particularly unemployment.

We did a study in ERS some time ago to determine just what impact self-employment had on the unemployment rate in metro versus nonmetro areas. Self-employment is of concern regarding unemployment rates because a lot of the self-employed workers are underemployed and this aspect of unemployment is not covered by the unemployment rate.

The incident of self-employed workers is about twice as great in nonmetro as in metro areas. Unemployment among self-employed workers usually occurs only after their self-employed business fails. But unreported underemployment occurs frequently with the self-employed.

Some of the self-employed workers have second wage and salary jobs which reduces the unemployment for those workers. However, the results of the study that we did showed that when the underemployment associated with self-employment is considered, the unemployment rate in nonmetro areas increased about 21 percent while it increased only about 10 percent in metro areas.

In addition, other differences in the economic structure and in the occupational distributions between rural and urban areas further contribute to this problem. For example, there is a substantial number of seasonal workers in nonmetro labor markets. These workers are employed in seasonal jobs in farm production, the marketing of agricultural products, the processing of food and fiber and recreation and tourist attractions, and many of these seasonal workers are underemployed throughout most of the year.

Seasonal employment is another source of hidden unemployment, and if one could adjust the unemployment rate for these factors, it would increase substantially.

Senator ABDNOR. You made a very, very good point, Mr. Coltrane.

I bet that Mr. Pulver has some thoughts on what underemployment does up in Wisconsin. It probably has more effect today and in the last few years than at any time since the depression. In South Dakota, underemployment is common not only out on the farms where the farmer loses money as he goes to work every day, but on our little main streets up and down the line. Both of these are results of the failing farm economy.

If you walk into some of these small communities, it looks like everybody is working. It is good they have jobs, but they have got to have some profits left over from whatever they are doing.

I don't think there is any kind of a measurement in labor statistics showing underemployment, is there?

Mr. PULVER. Not that I am aware of, but I think Wisconsin is pleasantly less struck by the farm crisis at this point than have been others of our neighboring States. It is getting quite harsh there as well, and it is clear that it does have its effect in the small towns in the State.

The point I would like to make is I think that whatever we do with regard to measures of the harshness of unemployment or underemployment in rural areas, it is important to recognize that whatever those data sets are, they need to be used at the national level, at the State level and hopefully at the local level.

At the present time not only are the data sets weak with regard to nonmetropolitan impact or rural impact at the national level, but when the numbers do exist, they are very often not even transmitted or broken out in a way that they become useful at the State and local level.

So it is one thing to generate a more precise measure of the difficulty in rural areas regarding employment and income, and another thing to translate that in a fashion which makes it useful at the State and local level.

Senator ABDNOR. Do you have any thoughts on how you do that?

Mr. PULVER. I tried to identify a number of things. There are two critical points that I would like to make. One is that although we talk about cooperation at the State and national level in terms of institutions collecting numbers, there is little evidence of that cooperation showing up in terms of higher quality numbers at the local level.

I think that greater use of the numbers we are already gathering at the State level for whatever purpose in terms of national meas-

ures and vice versa, that is data gathered at the national level which never finds its way to the local level, would be quite helpful.

The second thing is that I think that it is time for a complete reexamination of the issue of data deletion for nondisclosure purposes. I find it quite interesting that at the local level in the smallest town where absolutely everyone knows how many people are employed in every business we can get no information on secondary data which tells how many people are employed there.

On the other hand, in the larger cities where it would be very difficult to accumulate those numbers, they are possessed in a secondary data set, and it makes little sense to me. I recognize there are reasons of privacy and we want to look at these things, but I think a reexamination of data deletion and the essential judgment that we shouldn't deliver information to small communities, in rural communities needs some looking over.

Senator ABDNOR. I don't know how difficult that would be to get that changed. Would it take changes in legislation?

Mr. PULVER. That is why I said it needs to be examined. I would guess probably not. A lot of it is essentially institutional judgments which have been made regarding disclosure, and I think a reexamination of that would probably cause our bureaucracies to make slightly different judgments both at the State and National level regarding disclosure.

Senator ABDNOR. How difficult do you think it would be to do something like that, Mr. Coltrane?

Mr. COLTRANE. I am sorry?

Senator ABDNOR. How difficult do you think it would be to make a change like that in labor statistics reporting?

Mr. COLTRANE. Well, the reporting of labor statistics, or any statistics for small areas, is difficult under the present laws because of the confidentiality requirements. Data collecting agencies of the Federal Government can't report data where there is any chance that an individual or an individual business can be identified by the data that are reported.

Many rural areas are characterized by very sparsely settled populations. Some rural counties have only a few thousand residents.

Senator ABDNOR. What kind of information would we be getting that is so confidential? What kind of information do you think we need there?

Mr. PULVER. A good example is local communities are intensely interested in what is happening in terms of the sales within the framework of the businesses which are there. They are not interested in disclosing the sales that occur in the local grocery store per se, but they would like to have some sense of whether income is impacting on the community by declines in retail sales in some measurable kind of sense.

Those numbers, for example, are available in Iowa through the Iowa State sales tax system. The same information is gathered in Wisconsin, but we can't get it in that same form. Although the numbers are all collected, it is just a matter of reporting techniques. That is one example, another is what is happening in terms of total employment within the community.

Every time any specific community, let's say it is even 7,000 or 8,000 people or 10,000 people, which are not terribly small commu-

nities from the Wisconsin and South Dakota standpoint. Even in those communities data sets are unavailable. You can't know. And I am saying that the numbers are collected on a regular basis, but somehow that is going to disclose too much with regard to individual privacy.

A lot of it I am suggesting is simply not a matter of whether you are going to disclose data which interferes with privacy, but a matter of the cost of producing publications I guess.

Senator ABDNOR. It is difficult for me to understand what is so confidential about business activities. I can understand they wouldn't want to divulge trade secrets and similar things. I never thought of that as being a problem in trying to get information. You have opened up a whole new area of thought to me.

Well, do you really think it is possible to get to the problem of rural reporting? Do you think we can ever come up with a workable program?

Mr. BRIGGS. You may come up with a program, and I hope when you talk about program that you—

Senator ABDNOR. I don't mean a solution. I just want to get the facts so we know what is going on.

Mr. BRIGGS. But while part of that is gathering of the data, there is more to it than that. It is the commitment to a research agenda for rural America. That is, we need to focus very heavily on what is happening to the labor force and to the population of rural America as a separate entity, and of course you would want to look at how it relates to the urban area.

But during the 1970's again, the 1960's and 1970's, there was a very firm commitment in the Department of Labor to conduct research on human resource issues, and out of that came a lot of excellent work, much of which is cited in the footnotes of this paper, that were done in the Department of Labor due to its concern with the rural labor force as a basis for developing either policy or proposing an agenda for policy and to be able to understand the available numbers. I mean what do the numbers actually mean.

You have got to collect the numbers, but you have also got to have a research commitment, in my view, to go along with it. You need to be able to understand what those numbers say. That research commitment has been done away with in the Department of Labor here in the 1980's from very penny-wise and pound-foolish budget cuts.

I know you hear this all the time, but I can't help it. I would rub my sword here, too, because collecting numbers in and of itself is not going to get us very far. It is important, it is a first step and it is a vital part, but the numbers don't speak for themselves, and especially in rural America there are vast differences between the Southeastern United States, the Northwestern United States and the Southwestern United States in terms of the rural labor markets.

Simply aggregating all these together doesn't necessarily tell you what the best public policy for South Dakota, for New Mexico or for Georgia may be. That is, we have got to have some commitment to looking at the labor markets, understanding what is happening to these labor markets and what are the specific characteristics on a regional basis, an understanding of the particular geography of

the particular industry mixes, and these types of things needed to be able to help interpret what those numbers are.

So it has got to be more than simply a number collection. That is vital, but there has got to be something more to it, and I am afraid we have lost a lot in the last few years in terms of this research commitment. Without it there is not a great deal of basis for public policy development, in my view, that can be useful.

Senator ABDNOR. Thank you.

Mr. Coltrane, you were talking of underemployment. How could we obtain and make better use of that information? Do you think it could be done? It isn't used at all now as a factor, is it?

Mr. COLTRANE. It is not used very widely, sir. One way we might be able to report data that are more useable would be to report data for an aggregate of counties.

Mr. Briggs mentioned the diversity in rural labor markets between the various regions of the country. We need to be able to identify and analyze those differences.

One way to do that, and to get around the confidentiality issue, is to report data for more than one county. We could group nonmetro counties or rural counties that are similar in labor market structure together and report the data for that group of counties. That might require aggregating 10 counties or it might require aggregating 5. But in that way we would have data at a fairly low geographic area that would help us identify the issues and the problems, and analyze those problems for those particular areas.

Senator ABDNOR. The thing that concerns me with underemployment and unemployment is that underemployment is eventually going to lead unemployment. When that happens in the little rural communities, there is only one thing to do, and that is pack your bag and go toward the big cities and the metropolitan areas in search of work.

The overall lasting effect of this migration can be devastating to rural America. Many times you lose the best and most qualified people, and young people particularly. My State has probably more colleges and institutions of higher learning per capita than any State in the country. We have all kinds of small colleges, and we can't keep many of the young people in the rural areas.

The movement out of the rural areas really bothers me. I wonder what we are going to do to revitalize rural America and create some jobs out in those areas of the country. It worries me because I see my main streets falling apart, implement dealers going out of business and stores dropping in numbers.

When I was young my father owned one of four stores in a town of 400. Today, in that same town, there is one store remaining. In the next town that is bigger the same thing is happening. It was twice as big as our town, but today, only one store remains in operation. It is hard to create those jobs after they are lost. It is a problem that has visible implications.

Part of our overall theme of this rural study is to discover how we are going to revitalize rural America. What are we going to do? I know rural America is a lot bigger than the little towns that I have referred to in South Dakota. Even the towns with populations of 10 and 20 thousand are being devastated. They are having great trouble surviving.

We are trying to figure out some way to attack this whole problem. We have had some fine testimony and it is important that we assemble it into something usable. Certainly labor statistics, if they are accurate, could quickly point out the direction that rural America is heading.

Was Wisconsin able to offset the loss of the economy and agriculture in other ways in your towns and cities? Are you doing anything out there, Mr. Pulver, that I am not aware of?

Mr. PULVER. I am not sure whether you are aware of it or not, sir, but one of the things we have been doing a good bit of in the last 2 or 3 years is recognizing some of the kinds of problems that you have identified. It has been to begin working very specifically at the local level, the programs that I told you about in terms of community-by-community work. Essentially we get together chamber executives, local governmental officials, industrial people, and farmers to talk about what their options are in development.

Now just like in a single business a manager wants to have all the facts so he can make the proper kind of choice of what options offer the best alternatives, local community leaders have the same kind of need. That is why I was arguing very strongly for more information to allow them to make that choice.

In Wisconsin we have seen some very successful efforts in trying to bring back our small towns. Admittedly, we don't have the same kind of environment, for example, as western South Dakota where you have very broad agricultural areas. We have interspersed with that manufacturing areas, et cetera. But we are seeing very specific pockets in terms of types of people and in specific areas where unemployment rates run very high, and we are having the kind of migration influences that you identify.

The difficulty always is that we have to make those judgments based upon talking with people and not on the basis of any selected set of numbers. I realize the importance of joining together counties to serve as a data base, but when you get right down to the local level again, you data sets will be empty. And without that kind of base in which local leaders can work in their judgments, I think we are all going to have continued trouble.

Senator ABDNOR. I have to agree with you. When you see our bright and young people leave, you wonder what can be done.

Today, the telecommunications revolution is bringing remote areas into direct contact with the world. I think we would all agree with that. What role does new technology and new emerging information industries play in creating job opportunities in rural America?

Mr. PULVER. Well, that is an area where I spend a lot of my research time and a lot of interest time. What we are trying to do is get a clear handle on where those industries do locate and what kind of employment they require. The best handle we have at this point is that they are not, as we might have classically expected, big population concentration oriented necessarily, and we are finding that industries of that kind can live or be driven off of high-technology communications are locating in rural areas.

For example, in our State the two largest computer service bureaus are located in very small towns from a national perspective, one of about 6,000 and the other about 8,000 or 10,000. The tele-

communications agenda allows us the opportunity to locate almost anywhere in terms of wide ranges of business types, and we are trying to get a good handle on which ones of those high growth industries, future high growth industries can and will locate in rural areas to be able to provide some guidance to local leaders.

Senator ABDNOR. Who are you working with on that?

Mr. PULVER. At this point we have some financial support in that process from the ERS, the Economic Development Division as well as other USDA support to look at the location factors associated with the 40 high growth industries in the United States, most of which are nonmanufacturing.

What we have done is essentially taken a national sample of counties with a range of rural, intermediate, and metropolitan areas to see what are the location patterns and then trying to do some factoring out as to identify what kinds of things are associated with location.

Senator ABDNOR. So you are looking over industries that offer some opportunities for rural America.

Mr. PULVER. Yes; we are essentially looking at the 40 industries which are projected by the Bureau of Labor Statistics to have about two-thirds of the growth between 1980 to 1995 in employment, and they are things like eating and drinking establishments, business services, health care facilities, et cetera, and we are trying to see whether there are any barriers to their location and development in rural areas. If there are none, or if there are barriers which can be overcome, then we are going to suggest that National, State, and local policymakers do those kinds of things to provide an environment where the private sector might choose to locate in more rural areas.

Senator ABDNOR. Is anything like that going on, Mr. Briggs, in the rural areas of New York?

Mr. BRIGGS. I am not the best spokesman to speak on that subject about upstate New York, but certainly living in Ithaca with Cornell University, which is upstate New York and now the home of a large supercomputer contract, one of the four universities that is getting it, and they expect to have a great deal of fallout in job creation with the supercomputer and a particle synchrotron, or whatever they are building there and a new institute of biotechnology that the State has placed at Cornell, a massive multimillion-dollar undertaking. Biotechnology offers the possibility on both the plus and minus side for doing a lot of things for agricultural America and for rural America. But that is a special case.

Upstate New York, and I am relatively new to upstate New York, but I see that many of the problems of upstate New York are in many ways like small America, that is unlike the Southwest where I used to live and the Southeast where I have done a lot of my research work, and I think it is quite different.

That is why I think the geographic breakdown is so important for rural America. Many of the communities in upstate New York are in terrible shape, but they are in terrible shape because factories are closing. In other words, there are sort of mini urban problems in Massachusetts, New York, and what-have-you, but that is not a problem with the Southwest and it is not a big problem in the Southeast, but it is a very big problem in rural America in the

Northeast, that is it is factories that were once useful are no longer useful.

That is a different type of labor market situation, and that is why I think it requires a different type of analysis of the data. Rather than simply looking at the rural data as an aggregate, to begin with we have got to do some research around behind the numbers to indicate exactly what are some of the particular characteristics of the regional rural labor markets, and then to be able to talk about policy development along those lines.

There is a lot that can be said about public policy, and that is I think there has got to be some national commitment to this. I mean the Economic Development Administration, which has done in the past a great deal of work in rural America, is being again decimated by budget cuts and even its existence is in question.

A lot of rural America is in desperate need of infrastructure help, bridges, sewers, and these kinds of things that are not very popular to talk about and are very hard to finance.

Senator ABDNOR. That is true, but let me tell you something. Within the last few months the interest rates have dropped which has given hope to my farmers. The solution is a double-edged sword. If I want to make it possible for my farmers to do better, I think the best thing I could do is help open markets overseas and get the dollar down so they can compete.

If I could do something in an agricultural program and help them get their interest rates cut by 3 or 4 percent, that would put them back in business. Then they could buy cars and machinery again and put other businesses back to work.

If I could get the dollar so it was somewhat comparable to the other countries' currency values we could compete with any country in the world with our products. The problem starts when you are dealing with someone in dollars. They can buy 3 bushels of grain from our competitors for every bushel they can buy from America. We have a double-edged sword and, you bet, things are deteriorating.

That is why we are trying to come up with some happy medium to get rural America moving again. But, from looking over dissertations by fine agriculture economists and farm organizations, I again realize it is a very complex problem to solve. Congress is talking about putting together a farm package that could be very good news for agriculture, which is a lot of rural America. We could do many things if we had adequate funding.

As for beefing up some of the farm programs, we have spent more money over the last 4 years on some projects than we ever have before. But the tax laws and the monetary system have a big effect on these projects.

The whole idea of this study is to discover some answers to some problems. I want you to know how much we appreciate your input into today's topic. Our time is almost up for today. I would like to bring this meeting to a close this morning.

I thank you all, very, very much for making the effort to come down here and testify. We may be asking you by letter for additional information and maybe we can have you back another time.

I think you will agree with me that this is an important topic and that we have got a long way to go. It is even hard to make

Members of this Congress aware of the problems. They all have their self-interests and their congressional districts as their main concern. Some can't understand that everything is integrated. If we can get our thoughts and information together, we might make some headway.

After hearing these gentlemen and Ms. Norwood speak today, I personally feel that we need to do a much better job of gathering and reporting our statistics. Hopefully, you can help us put together some good suggestions so we can initiate some kind of action.

I will bet Mr. Coltrane with the Department of Agriculture must have a lot of thoughts on proposals.

We are happy to have you here today and hopefully, with your help, we can start coming up with some solutions.

I think that the whole United States will benefit from a rural revitalization if we can ever get one going. Not only does the rural labor force have untold productive potential, it is also a catalyst for greater economic activity throughout America.

Referring to South Dakota again, I have talked with many industries that have come to my State and they are very, very pleased with the kind of labor force they find there and the work that is carried out. They are not only hard workers, but they are talented workers. They just need to be put to work.

It is my sincere hope that today's hearing has made a contribution toward tapping that potential. We thank you all for coming.

On June 19, at our next hearing, we are going to look at a major source of the problems in rural America—rural finance. Finance has been a big problem within the rural areas. Rural America is being cheated and it has got to come to a stop. We are just going to keep plugging away and hopefully come up with some answers.

We thank you very much and the subcommittee is adjourned.

[Whereupon, at 11:30 a.m., the subcommittee adjourned, subject to the call of the Chair.]

RURAL FINANCE

WEDNESDAY, JUNE 19, 1985

CONGRESS OF THE UNITED STATES,
SUBCOMMITTEE ON AGRICULTURE AND TRANSPORTATION
OF THE JOINT ECONOMIC COMMITTEE,
Washington, DC.

The subcommittee met, pursuant to notice, at 10:09 a.m., in room SR-485, Russell Senate Office Building, Hon. James Abdnor (chairman of the subcommittee) presiding.

Present: Senators Abdnor and D'Amato.

Also present: Charles H. Bradford, assistant director; and Dale Jahr, professional staff member.

OPENING STATEMENT OF SENATOR ABDNOR, CHAIRMAN

Senator ABDNOR. The Subcommittee on Agriculture and Transportation of the Joint Economic Committee will come to order.

We're pleased to have so many witnesses with so much great expertise to testify today on behalf of the subject we're concentrating on—the financial situation of rural America. We want to welcome all of you to the fifth hearing in a series focusing on the rural economy.

Today's topic is not only fundamental to rural America, it is, in many respects, a prerequisite for rural development. Without adequate financial resources, rural America will not have the opportunity to encourage investment, attract new interests, retool existing industries, and provide consumer services demanded by the public; in short, rural economic vitality hinges on the presence and strength of the financial services industry.

Our domestic markets have been far from stable the past few years and financial institution failures are near post-depression records. A substantial portion of these failures are closely tied to the desperate economic condition of agriculture. Deposit insurance reserves are being drained at an alarming rate. Regulators appear to be having difficulty policing the industry. The industry itself has been blurring the distinction between the types of financial institutions. It is now difficult to distinguish between savings and loans, banks, securities dealers, mutual funds, money markets, insurance, and other financial services historically that have been in the past strictly separated.

Agricultural finance appears to be in shambles, as asset values and high default rates have put too many community lenders on the brink of insolvency. If they go under, will the Federal Government erect a rescue package with the same \$4 billion enthusiasm it had for the Continental Illinois Bank last year? I frankly doubt it.

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Even the farm credit system, with the resources and the integrity of the U.S. Government, is experiencing tremendous difficulty at the present time. I'm especially pleased that the Farm Credit Administration is represented here today.

We do welcome you all here. This is why we've been putting a great deal of concentration on rural America and its problems.

I happen to be very rural, myself, about as rural as you can find out in South Dakota coming from a community of 370 people and living all my life there. Of course, by Government definition, rural is a lot bigger than that.

I have a great, great concern for rural America. I'm firmly convinced that rural America is written off—maybe not intentionally, but it is small enough, apparently, that many of the people, when they discuss rural related topics do not include rural America.

And I'm not just speaking of agriculture. I'm talking about the main streets and some pretty sizable towns. Unless some attention is directed to these people and these areas, it could be bad news. Not only for the rural areas themselves, but the great contribution that they make to all America.

We've been delving into the problem and possible solutions. Certainly, the financial situation in these rural areas is extremely paramount and important, so this is what our group of panelists that we have here today are going to be discussing. We welcome all of you to the subcommittee.

We're going to start off our hearing with our first witness. We're very, very pleased to have him with us. Charles Partee, Board of Governors, Federal Reserve System.

Mr. Partee, we welcome you to the subcommittee and appreciate your presence here.

You can go ahead. We have your prepared statement. Your entire statement will be made a part of the record and you can proceed in any manner you care.

STATEMENT OF HON. J. CHARLES PARTEE, MEMBER, BOARD OF GOVERNORS OF THE FEDERAL RESERVE SYSTEM

Mr. PARTEE. Thank you, Mr. Chairman. I'll summarize my statement, with your permission.

I appreciate the opportunity to appear today to discuss the current difficulties being experienced by the banks in our agricultural communities. As you are well aware, these problems have been intensifying lately as more farmers have been finding it difficult, if not impossible, to meet fully the contractual terms of their loan obligations.

The origin of these problems can be traced to the 1970's. Our farm sector experienced a major economic boom during that decade and many farmers expected the good times to continue in the 1980's. Consequently, farm indebtedness surged, rising, after allowance for inflation, about 60 percent from 1971 to 1979.

As it turned out, however, the agricultural boom of the 1970's gave way to a bust in the 1980's. Both here and abroad, the high farm prices of the 1970's attracted additional resources into agriculture. Moreover, further breakthroughs in genetics and farm technology enhanced productivity of such resources. Thus, farm

production has been increasing at a considerable pace over this decade. At the same time, growth in demand for American agricultural products has weakened. Farm exports, in particular, have been reduced by sluggish economic conditions abroad and the high exchange value of the U.S. dollar, as well as by the expanded ability of other nations to meet consumption needs from their own internal production. These market developments have kept farm prices persistently depressed. As a result, farm income has been low for 5 years in a row and land values have been declining since 1981.

Farm debt, though no longer increasing, still is high and interest rates on farm loans, while down from earlier levels, remain well above those prevailing in the last decade when much of the debt was incurred. Thus, many farmers are faced with the problem of servicing a large volume of debt at relatively high interest rates with a substantially reduced level of farm earnings. High interest rates and reduced income flows have also added to the downward pressure on land values, thus further limiting the farmers' ability to pay down debt by selling these assets.

The earnings of all farmers have been adversely affected by lower product prices, but not all are experiencing the same degree of financial stress. Farmers that are relatively debt free have suffered declines in asset values, but are not in danger of falling into insolvency. In contrast, producers who entered the 1980's with only a relatively small equity cushion have been experiencing increased financial difficulties. Estimates indicate that perhaps a third of the full-time producers have debt burdens large enough to cause financial stress. And this group owes about two-thirds of all farm debt. The greater proportion of this debt is owed to the farm credit system, the Farmers Home Administration, and individuals; nevertheless, about one-quarter of total farm credit—about \$50 million—is provided by commercial banks and a sizable proportion of the farm loan portfolios of many banks have become troubled to a greater or lesser degree.

Commercial banks experience only minimal problems in their farm loan portfolios during the 1970's. Such problems began to pick up in 1981 and have been increasing steadily since then. One indication of the deterioration in the quality of agricultural loans at banks that has occurred since then is provided by the very sharp rise in delinquencies and chargeoffs.

Last year's high chargeoffs and an increase in provision of loan-loss reserves had a marked depressing effect on the profitability of many agricultural banks. On average, returns on equity fell to 9 percent, down from returns averaging between 14 and 16 percent in every year from 1979 to 1982. There was great variation in earnings recorded among agricultural banks, however, mainly reflecting differences in loan loss experience.

In the aggregate, earnings of agricultural banks were high enough to permit a further buildup in the average capital ratio of these banks and the capital ratios of most agricultural banks remain high relative to those of nonfarm banks. But more farm banks seem certain to come under financial strain if farm loan losses continue and intensify. And a troubling number of farm banks experiencing relatively high loan losses have already suf-

ferred an erosion of their capital base, thus increasing their vulnerability to failure should such losses continue.

Such extremely adverse results have been occurring in small, but increasing, numbers. Last year, 32 agricultural banks failed, mostly in the second half of the year, compared with only 7 in 1983. Many of these banks came from a group that had reported delinquent loans at the beginning of the year in excess of capital of the bank. Unfortunately, the number of agricultural banks in this condition, while still a relatively small proportion of the 5,000 agricultural banks, rose further during 1984. Agricultural bank failures are likely to rise commensurately; indeed, 30 farm bank failures already have occurred, accounting for two-thirds of the banks that have failed so far this year.

I'll skip over to a later page, Mr. Chairman.

The debt adjustment program first announced by the administration last September, and then modified in March, will offer farm banks and their farmer customers some assistance in moving through the difficult transition period that appears to lie ahead. As you know, under this program, the Government will guarantee most of the remainder of a troubled farm loan after the lender reduces the principle amount or an equivalent in interest charges, 10 percent or more, as needed to reduce the borrower's debt service burden to a level that he appears able to handle. Through May, the Farmers Home Administration had guaranteed only 259 loans, totaling \$36.7 million. I understand, however, that the Farmers Home Administration, under its regular loan guarantee program, this year already has guaranteed over 5,000 loans, totaling nearly \$700 million, and that the total outstanding volume of guaranteed loans is approaching \$5 billion.

The Federal Reserve also revised and extended its seasonal lending program in March of this year with the objective of making sure that agricultural banks will have sufficient liquidity to provide needed production loans to their farmer customers. In announcing this broadened program, we noted that there were few, if any, signs to indicate that agricultural banks generally would experience any unusual shortfall of liquidity. The action was taken, nevertheless, to have in place a means to offset any unforeseen liquidity strains that might arise in local areas or for individual banks, thus threatening the necessary flow of credit to farmers.

Total borrowing in our seasonal program currently is running about \$150 million. This figure is below that of last year at this time, the difference reflecting mainly easier bank funding conditions in the money market.

The Federal Reserve, as well as the other Federal banking agencies, also has reiterated its policy of instructing bank examiners to refrain from taking supervisory actions that would discourage banks from exercising appropriate forbearance when working with farmers or other small businesses with delinquent loans. It is not the intent of this policy to encourage or permit loan decisions that are inconsistent with the banks' long-term safety and soundness. The policy recognizes, however, that if there is good reason to believe a borrower's difficulties are temporary in nature, it is prudent banking policy to extend the dates of his loans and, in some cases, to grant additional credit to carry him over a period of dis-

tress. Reserve banks have designated senior review examiners with expertise in supervising farm banks to oversee the administration of this policy.

Mr. Chairman, while the credit-related programs and practices I have just reviewed have assisted farmers to obtain credit accommodation, I wish to emphasize that they do not offer a solution to the problems facing the farm sector. Indeed, no credit program can do that because, fundamentally, the farmers' problems are not traceable to an inability to obtain credit.

Reference to experience during the current year will help illustrate this point. There was considerable concern early on that a fairly large number of farmers would not be able to obtain credit to finance their production activities. But as matters turned out, most farmers were able to obtain production loans adequate to meet their needs, either from lending institutions that have financed them in the past or, if cut off from these lenders, from alternative sources. Moreover, some who are unable to obtain credit to fully satisfy their needs adopted various cost-reducing measures in order to plant their crops, such as using less fertilizer. And in cases where land was given up by farmers unable to continue, it was generally taken up and planted by new operators. Thus, plantings have not been significantly impaired by a lack of credit availability and another exceptionally large harvest is in prospect.

That, of course, is not an unmixed blessing. With large harvests also apparently in train in other major agricultural producing countries, and with no indication that effective demands for such products will expand dramatically, it appears very likely that agricultural prices will remain depressed. Indeed, in response to these prospective supply and demand conditions, farm product prices have been declining further this spring from already depressed levels. The implications of these developments for incomes of farmers are obvious—they, too, will remain depressed.

Thus, there is a good chance that the number of farmers experiencing serious strains will continue to grow, which, in turn, means that an increasing number of farm banks, particularly those that have the greatest concentration of farm loans in their portfolios, will be encountering growing difficulties because of the inability of their farmer customers to service debts. These conditions will further undermine the capital positions of more banks, adding to the number that will be in danger of failing.

In my view, the best way to deal with these very serious problems for banks, and indirectly provide the best help to farmers, will be to encourage and facilitate the merger of weak banks with stronger banking institutions, particularly those that are not now so heavily involved in agricultural lending. That would offer several important advantages. First, it would transfer control of the institution's lending resources to a bank with a better management record. Second, it would provide an infusion of real permanent capital into the bank and, thus, into agricultural lending in general. Finally, mergers with banks outside the community of agricultural banks would promote greater diversification of portfolio risk. In this way, the banking system would come to be better protected against unforeseen developments that from time to time adversely affect the financial health of different sectors of the economy—

energy, for example, real estate, for example, as well as agriculture.

There is no doubt that the agricultural sector has been going through some very hard times because of unanticipated weakness in farm product markets that will no longer support the built-in structure of high indebtedness. Many banks that have concentrated their lending in the farm area are encountering difficulty because of the inability of farmers to service their debts and it may be that more will be driven to the point of bankruptcy. But as I see it, the best way to deal with an erosion of capital is to obtain replacement funds from present or prospective bank owners. And where the banks' problems appear too severe and fundamental to handle in this manner, the best solution is to seek mergers with other institutions that promise a larger, more stable lending and deposit base.

Thank you, Mr. Chairman. That completes my statement.

[The prepared statement of Mr. Partee follows:]

PREPARED STATEMENT OF HON. J. CHARLES PARTER

I appreciate the opportunity to appear before this committee to discuss the current difficulties being experienced by banks in our agricultural communities. As members of this Committee are well aware, these problems have been intensifying lately, as more farmers have been finding it difficult, if not impossible, to meet fully the contractual terms of their loan obligations.

The origin of these problems can be traced to the 1970s. Our farm sector experienced a major economic boom during that decade, and many farmers expected the good times to continue in the 1980s. There was, in particular, a general perception that there were limits on potential world production of agricultural products and that this would continue to encourage a rapid growth in farm exports, thus fostering increasing returns to land and other farm inputs. Many also believed the more rapid inflation of the decade would persist, so that long-term indebtedness could be paid off with less valuable future dollars. Acting on these expectations, farmers and other investors acquired additional farm land, bidding up its price in the process. Farmers also invested heavily in new machinery and equipment. Moreover, in view of the apparently favorable outlook for agriculture and, for most of the decade, of interest rates that were low relative to the expected rise in income and asset prices, many thought it advantageous to finance a relatively large share of these investments with borrowed money. Consequently, farm indebtedness surged, rising, after allowance for inflation, about 60 percent from 1971 to 1979.

As it turned out, however, the agricultural boom of the 1970s gave way to a bust in the 1980s. Both here and abroad, the high farm prices of the 1970s attracted additional resources into agriculture. Moreover, further breakthroughs in genetics and farm technology enhanced the productivity of such resources. Thus, farm production has been increasing at a considerable pace over this decade. At the same time, growth in demand for American agricultural products has weakened. Farm exports in

particular have been reduced by sluggish economic conditions abroad and the high exchange value of the U.S. dollar, as well as by the expanded ability of other nations to meet consumption needs from their own internal production. These market developments have kept farm prices persistently depressed. As a result, farm income has been low for five years in a row, and land values have been declining since 1981.

Farm debt, though no longer increasing, still is high; and interest rates on farm loans, while down from earlier levels, remain well above those prevailing in the last decade when much of the debt was incurred. Thus, many farmers are faced with the problem of servicing a large volume of debt, at relatively high interest rates, with a substantially reduced level of farm earnings. High interest rates and reduced income flows also have added to the downward pressure on land values, thus further limiting the farmers' ability to pay down debt by selling these assets.

The earnings of all farmers have been adversely affected by lower product prices, but not all are experiencing the same degree of financial stress. Farmers that are relatively debt-free have suffered declines in asset values but are not in danger of falling into insolvency. In contrast, producers who entered the 1980s with only a relatively small equity cushion have been experiencing increasing financial difficulties. Estimates indicate that perhaps a third of the full-time producers on commercial-sized family farms have debt burdens large enough to cause moderate to severe financial stress, and this group owes about two-thirds of all farm debt. The greater proportion of this debt is owed to the Farm Credit System, the Farmers Home Administration and individuals. Nonetheless, about one quarter of total farm credit is provided by commercial banks, and a sizable proportion of the farm loan portfolios of many banks have become troubled to a greater or lesser degree.

Commercial banks experienced only minimal problems in their farm loan portfolios during the 1970s. Such problems began to pick up in 1981 and have been increasing steadily since then. One indication of the deterioration in the quality of agricultural loans at banks that has occurred since then is provided by data on delinquencies and charge-offs. While not all banks are required to report such data for their farm loans, from available information our staff estimates that at the end of March of this year, nonaccrual farm production loans at all banks in the nation totaled about \$1.7 billion, and other nonperforming loans--those past due 90 days or more but still accruing interest, plus renegotiated troubled loans--totaled about \$0.9 billion. In addition, about \$1.3 billion of farm production loans were past due 30 to 89 days. Altogether these poor performing and nonperforming loans constituted about 10 percent of all farm production loans.

In addition, net charge-offs of farm loans at all commercial banks are estimated to have been about \$900 million in 1984, or a bit more than 2 percent of outstandings. Of this total, \$240 million was reported by banks in California, representing about 6 percent of their outstanding farm loans. While California banks led the nation in charge-offs, these losses presented less of a problem for them than for banks in many other states. This was because most of the losses were booked by major banks with large branching systems, where agricultural loans constituted a relatively small proportion of their total asset portfolios. In contrast, many banks operating in agricultural areas of states that limit branching--states found mainly in the midwest--have had more trouble accommodating to their loan losses because of the high concentration of these loans in their asset portfolios.

Last year's high charge-offs and an increase in provision of loan loss reserves had a marked depressing effect on the profitability of many agricultural banks (banks at which the ratio of farm loans to total loans exceeds the average of

such ratios at all banks, currently about 17 percent). On average, returns on equity fell to 9 percent, down from returns averaging between 14 and 16 percent in every year from 1973 through 1982. There was great variation in earnings recorded among agricultural banks, however, mainly reflecting a sharp difference in loan loss experience. Thus, 12 percent of these banks reported negative earnings last year, and another 9 percent recorded only minimal positive earnings. At the same time, over half earned over 10 percent on equity, and nearly a fifth over 15 percent.

In the aggregate, earnings of agricultural banks were high enough to permit a further up in the average capital ratio of these banks, and the capital ratios of most agricultural banks remain high relative to those at nonfarm banks. But more farm banks seem certain to come under financial strain, if farm loan losses continue and intensify. Moreover, as I have noted, a small but troubling number of farm banks experiencing relatively high loan losses have already suffered an erosion of their capital base, thus increasing their vulnerability to failure should such losses continue.

Such extremely adverse results have been occurring in small but increasing numbers. Last year, 32 agricultural banks failed--mostly in the second half of the year--compared with only 7 in 1983. Many of these banks came from a group that had reported delinquent loans at the beginning of the year in excess of the capital of the bank. Unfortunately, the number of agricultural banks in this condition, while still a relatively small proportion of the 5,000 agricultural banks, rose further during 1984. At 102 agricultural banks, nonperforming loans at the beginning of this year exceeded total capital, up from 44 a year earlier. Moreover, at 240 agricultural banks, the combined sum of past due and nonperforming loans exceeded total capital, up from 133 a year earlier. Agricultural bank failures are likely to rise commensurately; indeed 30 farm bank failures already have occurred, accounting for two-thirds of the banks that have failed so far this year.

To sum up the current situation, while the incomes of the great bulk of our farmers have been reduced since the beginning of this decade, those that got heavily into debt in the 1970s are primarily the ones experiencing serious financial strains, with the severity of these strains increasing with the degree of their leveraging. While such farmers constitute only about one-third of all farmers, they account for about two-thirds of all agricultural debt. As many of these borrowers have found it increasingly difficult to service their loans, banks and other agricultural lenders have been encountering increasing problems. To date, information suggests that the great majority of farm banks remain in good condition despite these problems, but a significant and growing number is experiencing an increasing degree of strain.

That so many of our farm banks remain in relatively strong condition after five years of depressed conditions in the agricultural sector stands, I believe, as a tribute to their management. What this rather clearly suggests is that these banks generally followed prudent standards in extending credit to their farm customers during the boom times of the 1970s, standards which tended to hold down the degree of leveraging permitted individual customers--and in the process helped to dampen tendencies for these customers to become over extended. In addition, many farm banks followed policies that permitted them to maintain reasonably diversified asset portfolios.

Banks that failed to adhere to high standards of quality and asset diversity have been considerably more vulnerable to the effects of deteriorating circumstances of agricultural borrowers. One can point to situations in which a bank that is failing or in extremely troubled condition is located in close proximity to one or more other banks that remain in good condition. In addition, I understand that the FDIC, in a study it conducted of the banks that failed in 1984, found evidence of various kinds of

abusive practices, including improper insider transactions, instances of possible fraud, and other forms of irregular management activities.

The management policies and practices of banks, of course, tend to vary along a continuum. Thus, the longer conditions in the agricultural sector remain depressed, the greater will be the number of banks experiencing problems of greater severity. As I have noted, that process is already quite observable in the trends of recent years. Since no dramatic change appears likely in the current balance between supply and demand in agricultural markets, such trends seem almost certain to continue for some time to come. Put more directly and graphically, it seems quite possible that many more agricultural banks and their farmer customers will experience severe financial dislocations over the next several years. I should hasten to add that at present it still appears that the great majority of farmers and of farm banks have sufficient financial strength to weather these conditions, although not without growing strains and problems.

The debt adjustment program, first announced by the Administration last September and then modified in March, will offer farm banks and their farmer customers some assistance in moving through the difficult transition period that appears to lie ahead. As Committee members know, under this program the government will guarantee most of the remainder of a troubled farm loan after the lender reduces the principal amount (or an equivalent in interest charges) 10 percent or more as needed to reduce the borrower's debt service burden to a level that he appears able to handle. Through May, the Farmers Home Administration had guaranteed 259 loans totaling \$36.7 million. I understand, moreover, that the Farmers Home Administration, under its regular loan guarantee program, this year already has guaranteed over 5,000 loans totaling nearly \$700 million, and that the total outstanding volume of guaranteed loans is approaching \$5 billion.

The Federal Reserve also revised and extended its seasonal lending program in March of this year with the objective of making sure that agricultural banks will have sufficient liquidity to provide needed production loans to their farmer customers. The regular seasonal program, in place since 1973, provides discount window credit to depository institutions with limited access to national money markets that experience recurring seasonal swings in net needs for funds because of the way their deposit flows fluctuate relative to their loan demands. This existing program was liberalized to increase the portion of the seasonal funding needs that the Federal Reserve stands ready to supply to small and mid-sized institutions. In addition, a temporary simplified seasonal program has been established as an alternative source of seasonal credit. Aimed particularly at smaller banks substantially involved in agricultural lending, this program offers institutions with total loan growth above a base amount of two percent the opportunity to fund half of any further loan expansion through discount window loans, up to a maximum amount of five percent of the institution's total deposits.

In announcing the broadening of its seasonal credit program, the Federal Reserve noted that there were few if any signs to indicate that agricultural banks generally would experience any unusual shortfall of liquidity. The action was taken, nevertheless, to have in place a means to offset any unforeseen liquidity strains that might arise in local areas or for individual banks, thus threatening the necessary flow of credit to farmers. Total borrowing in our seasonal program is currently running around \$150 million. This figure is below that of last year at this time, the difference reflecting mainly easier bank funding conditions in the money market.

The Federal Reserve, as well as the other federal banking agencies, earlier this year reiterated its policy of instructing bank examiners to refrain from taking

supervisory actions that would discourage banks from exercising appropriate forbearance when working with farmers or other small businesses with delinquent loans. It is not the intent of this policy to encourage or permit loan decisions that are inconsistent with a bank's long term safety and soundness. The policy recognizes, however, that if there is good reason to believe a borrower's difficulties are temporary in nature, it is prudent banking policy to extend due dates on his loans and in some cases to grant additional credit to carry him over a period of distress. Reserve Banks have designated senior review examiners with expertise in supervising farm banks to oversee the administration of this policy.

Mr. Chairman, while the credit-related programs and practices I have just reviewed have assisted farmers to obtain credit accommodation, I wish to emphasize that they do not offer a solution to the problems facing the farm sector. Indeed, no credit program can do that because, fundamentally, the farmer's problems are not traceable to an inability to obtain credit.

Reference to experience during the current year will help illustrate this point. There was considerable concern early this year that a fairly large number of farmers would not be able to obtain credit to finance their production activities. But as matters turned out, most farmers were able to obtain production loans adequate to meet their needs either from lending institutions that had financed them in the past or, if cutoff by these lenders, from alternative sources. Moreover, some who were unable to obtain credit to fully satisfy their needs, adopted various cost reducing measures in order to plant their crops--such as using less fertilizer. And in cases where land was given up by farmers unable to continue, it was generally taken up and planted by new operators. Thus plantings have not been significantly impaired by a lack of credit availability and another exceptionally large harvest is in prospect.

That, of course, is not an unmixed blessing, because, with large harvests also apparently in train in other major agricultural producing countries and with no indication that effective demands for such products will expand dramatically, it appears very likely that agricultural prices will remain depressed. Indeed, in response to these prospective supply and demand conditions, farm prices have been edging down in recent weeks from already depressed levels. The implications of these developments for incomes of farmers are obvious--they, too, will remain depressed.

Thus, as I have reviewed earlier, there is a good chance that the number of farmers experiencing serious strains will continue to grow which, in turn, means that an increasing number of farm banks, particularly those that have the greatest concentration of farm loans in their portfolios, will be encountering growing difficulties--because of the inability of their farmer customers to service debts. These conditions will further undermine the capital positions of more banks, adding to the number that will be in danger of failing.

In my view the best way to deal with these very serious problems for banks--and indirectly provide the best help to farmers--will be to encourage and facilitate the merger of weak banks with stronger banking institutions, particularly those that are not now so heavily involved in agricultural lending. That would offer several important advantages. First, it would transfer control of the institution's lending resources to a bank with a better management record. Second, it would provide an infusion of real, permanent capital into the bank and thus into agricultural lending in general. Finally, mergers with banks outside the community of agricultural banks would promote greater diversification of portfolio risk. In this way, the banking system would come to be better protected against unforeseen developments that, from time to time, adversely affect the financial health of different sectors of the economy.

There is no doubt that the agricultural sector has been going through some very hard times because of unanticipated weakness in farm product markets that will no longer support the built-in structure of high indebtedness. Many banks that have concentrated their lending in the farm area thus are encountering difficulty because of the inability of farmers to service their debts, and it may be that more will be driven to the point of bankruptcy. But, as I see it, the best way to deal with an erosion of capital is to obtain replacement funds from present or prospective bank owners. And where the bank's problems appear too severe and fundamental to handle in this manner, the best solution is to seek mergers with other institutions that promise a larger, more stable, lending and deposit base.

Senator ABDNOR. Thank you, Mr. Partee. I'm very impressed with your statement. But I'm not encouraged by it—

Mr. PARTEE. No; it's not very encouraging.

Senator ABDNOR [continuing]. But I'm impressed. Obviously, I think you have a very good grasp of the situation. I don't know if we have many of the answers.

I'm really very, very concerned about the direction rural finance is going to go. The mergers of rural banks are fine, but I guess at some point banks feel that they can't take the risk of additional loans to keep the farmers operating. I think you said that one-third of the farmers of this country have two-thirds of the total farm debt.

How much farther will a bank carry the farmers who are in trouble? Some farmers are getting pretty close to going under. I know nothing about banking or how you make your loans, but I have a feeling that bankers at some point tell the farmer that they will not be loaned any more money.

What would happen if that third that are in debt, suddenly, had to be foreclosed on? What do you think would happen to the whole farming picture? I suppose a ton of land would go on the market and land would be dropping additionally, which would affect that other two-thirds. It could be real chaos before we get through, couldn't it?

Mr. PARTEE. Well, I think, Mr. Chairman, that you would have to take it on a case-by-case basis. There is no chance, as I see it, that all one-third of the farmers that are in debt would be foreclosed at anything like the same point in time. Some of them are in pretty decent shape and have assets—

Senator ABDNOR. The bottom third, you mean?

Mr. PARTEE. Some of them are, yes. And so I think it would be spread in a continuum over time and it wouldn't occur with all of them, but it might be a considerable number. The banker is, of course, a businessman.

Senator ABDNOR. Yes.

Mr. PARTEE. And the banker is going to try to do what's best for his institution. He'll string along with a customer if he thinks the customer can pay, if that's his best option. But if things go to the worst case, why, the banker will, I think, foreclose the loan.

Now whether or not he sells the property in the market will depend again on conditions in the property market. We permit banks to hold foreclosed assets for a considerable period of time, up to five years.

Senator ABDNOR. Oh, yes.

Mr. PARTEE. In the case of real estate. And it would again be a matter for the individual bank, looking at his market, to decide whether his best bet would be to force the land out on the market or to hold it, hoping for a better time in the next 1 or 2 or 3 or 4 years.

That, of course, is not a free decision for him to make because when he's holding the land, he's not going to get much return on it. And so time is money in this case, you see.

But I think that it would be difficult, very difficult, but it wouldn't be as totally disorderly as your question seemed to suggest.

Senator ABDNOR. There's no question that I feel the administration is starting to sell their tax reform bill too quickly. I was much more, and I think the whole Nation should be much more, interested and concerned about the deficit reduction package that's now in the conference committee.

A few months ago, in businesses throughout the Nation, the deficit was the biggest concern. Every Member of this Congress was going around saying that we've got to cut \$50 billion, we've got to do this and that. Now, it bothers me when we're in conference and trying to come to some kind of an agreement between the two Houses that would have some significance or some effect on the whole financial picture of this country, and there's really not much attention being devoted to our deficit problem.

If we were to cut spending as proposed in the Senate version, I believe interest rates would drop. What would happen if interest rates would go down 2, even 3 percent in the next year. What would a 3-percent drop in interest rates mean to the farmers of this country? Would that make a big difference to that third that are in trouble?

Mr. PARTEE. For some of them it would. I think it's a continuum. The return on farming is pretty low these days.

Senator ABDNOR. Yes.

Mr. PARTEE. So that if you cut, say, the average rate, in our most recent survey, for small farm banks was 13½ percent for farm loans. If it were 10½ rather than 13½, obviously, some farmers would be able to make it that can't make it at 13½. But I wouldn't—it's not a panacea.

Now I might just comment, Mr. Chairman, that interest rates have dropped 3 percent in the last 30 days.

Senator ABDNOR. Yes; they have.

Mr. PARTEE. Not in the farm country, but generally in the market. And I think that some of that will be transmitted to rural banks in the time to come.

Senator ABDNOR. Why is that? Why not on farm—

Mr. PARTEE. Well, because I think the farm banks see that their expenses, including the expenses of having to book losses, are very large. And thus, they're quite reluctant to cut their rates.

As I commented in my statement, their profits are down. Some are making losses. There's a tendency, again, for a businessman to want to cover his costs. And if he can't cover his costs, why, he thinks he's going to go under. And so there's a reluctance in the farming areas to cut interest rates for that reason.

Senator ABDNOR. Again, I know nothing about the banking business, as I say, but I can't help but note that our banks are loaning huge sums of dollars to foreign countries at low rates of interest. You can't convince me that those foreign countries are a good risk.

How do we justify that over my farmers? I think they're probably every bit as good and deserving.

Mr. PARTEE. Well, Mr. Chairman, it's a matter of private contract. I think if you were to give the banks that are lending abroad the option not to do that, they would certainly like to get their money out, just as I suppose a lot of farm banks would like to get their money out of farm loans right now.

But they are stringing along with their borrowers just as the farm banks are stringing along with theirs. And we encourage it in both cases because there doesn't seem to be any better solution.

I might comment that the rate that you see for foreign loans, like the Latin American countries, is almost always tied to prime and it's just a little bit over prime, like $1\frac{1}{2}$ percent over. But those are loans to the governments of those countries.

If you were to take a loan to a private borrower in, say, Mexico, or Argentina, or Brazil, I'm not so sure that the rate would be lower than's being charged by an American bank than to a farmer because there is credit risk in addition to exchange risk in those private deals, just as there is credit risk in loans to farmers.

Senator ABDNOR. Are you familiar with a proposal—and we're talking about farm loans here—that was included in the Senate budget resolution for the future under the FmHA? The trend is to go entirely from direct loans to guaranteed loans, phasing them in over a 3-year period. The proposal we passed assumed that in the budget we'd have all guaranteed loans by the end of the third year with a buydown provision. I think we would buy down with the banks up to 3 percentage points in interest rates for these guaranteed loans. Do you think that is a workable provision?

Mr. PARTEE. I don't know the details of that proposal, Mr. Chairman. I can't really comment.

If the Government is prepared to guarantee farm loans, why, of course, that makes the farm loans good credit—

Senator ABDNOR. About 90 percent.

Mr. PARTEE [continuing]. And the banks would be prepared to hold them. But, of course, the cost, the ultimate cost to the taxpayer, could be very great.

Senator ABDNOR. Well, if it were solid it would, yes.

Mr. PARTEE. Yes.

Senator ABDNOR. Does the Federal Reserve System take into account how changes in the monetary policy will affect rural financial institutions?

Mr. PARTEE. Yes, we certainly do. We have, as I'm sure you know, a large network through the reserve banks of experts on farm credit and farm matters. We have contacts with communities out there. All Federal Reserve banks now have special counsels of agricultural and small business people who advise them. And so we're well-informed on conditions in the farm sector.

Now our problem is the same as it is when, at times in the past builders have said to us, why not take care of housing? I mean, why don't you do something for housing? Or exporters have said, why don't you take care of the export financing needs? Or the cities, like Detroit and New York, have said, why don't you take care of the special needs of the cities in financing themselves?

The problem is that the monetary policy is a macroinstrument. It affects everything and it falls on everybody and there isn't any way that we can, say, have a policy that benefits agriculture to the expense of builders, car manufacturers, and so forth. It affects everybody. So that although we're aware of conditions and can do things like this seasonal credit program that I mentioned that are of marginal help, in general, monetary policy can't be guided by a particular sector of the economy.

Senator ABDNOR. You have revived an incident I had with a Federal Reserve man.

I was out at our State capital one time and a friend, a banker, took me to a luncheon because he had a regional Federal Reserve man with him. I was very concerned at that time with the condition of the farm program and the whole farm economic picture.

I asked the gentleman if he was concerned, because times were getting tough then, at least out in that country. He told me that there was nothing to worry about. He told me they appreciated the farmers problem. I said, "well, by God, you can't eat appreciation if you're hungry." You've got to have some cash flow.

I feel the policy of generously lending to farmers a few years back may have hurt the farmers more than help them. I don't know how much consideration was given by the Federal Reserve Board then, but they were very generous. There were banks that were loaning people more money than they were even asking for, just as though the bubble was never going to burst.

It really wasn't that way.

Wouldn't you admit now, as we look back, that might have been a heck of a mistake?

Mr. PARTEE. I think that, as has been the case in a good many areas over time, the expectation of appreciation factoring in in finance is a dangerous business. I remember many years ago meeting with the directors of the farm credit system out in Denver and it was said there, well, you know, farming is the only business where a man loses money every year and dies a millionaire. [Laughter.]

Well, that's the thought, that the appreciation is going to carry it, and that's how you get speculative bubbles. And what we had was a speculative bubble in farm real estate that is now being washed out, as they often are with the passage of time.

So I absolutely agree with you. I don't know who the Federal Reserve man you were talking to was, but I know that we have been

concerned about the use of farm credit for years in the system, that it was excessive.

But, again, it's a decision on the part of the banks. The Government, which was very active through the Farmers Home Administration in sponsoring loans, the farm credit system, which is associated with the Government, everybody was lending lots of money to farmers. And the farmers borrowed too much and now we've got to pay the piper.

Senator ABDNOR. We've just been joined by another member of this committee that we think very highly of, Senator D'Amato of New York. I've been acquainted with him from the Banking Committee, but he's also a very important part of this committee.

Senator D'Amato, we're certainly happy to have you here.

Senator D'AMATO. Well, thank you very much, Mr. Chairman. I ask, in the interest of time, that the opening statement that I have prepared be inserted in the record. I'd be deeply appreciative.

[The written opening statement of Senator D'Amato follows:]

WRITTEN OPENING STATEMENT OF HON. ALFONSE M. D'AMATO

MR. CHAIRMAN, I THANK YOU FOR INVITING ME TO PARTICIPATE IN THIS HEARING ON RURAL FINANCE. S SERIES OF HEARINGS ON THE RURAL ECONOMY HAS BEEN EXTREMELY INFORMATIVE. I COMMEND YOU FOR YOUR EFFORTS IN MAKING MORE PEOPLE AWARE OF THE CHANGING NEEDS OF RURAL AMERICA..

RURAL AMERICA HAS BEEN DEPICTED FOR FAR TOO LONG AS ONLY THE AGRICULTURAL AREAS OF OUR COUNTRY, WITH LITTLE REGARD PAID TO OTHER SEGMENTS OF THE RURAL ECONOMY. ALTHOUGH FARMS DO MAKE UP A LARGE PORTION OF RURAL COMMUNITIES, WE MUST NOT FORGET THE RELATED BUSINESSES AND SERVICES THAT ARE NECESSARY IN THESE AREAS. THE SMALL ENTREPRENEUR IS AN EXTREMELY IMPORTANT PERSON IN THE RURAL COMMUNITY; HIS FINANCIAL NEEDS MUST BE MET.

IN MY STATE OF NEW YORK, THE VAST MAJORITY OF EMPLOYMENT IS FOUND IN THE SERVICE ORIENTED SECTOR. WHILE

THE FARMING, FORESTRY, MINING, AND FISHING INDUSTRIES HAVE DECLINED, NEW YORK HAS SEEN TREMENDOUS GROWTH IN THE PROFESSIONAL, TECHNICAL, AND TRADE INDUSTRIES. SURPRISINGLY, THIS GROWTH IS NOT IN THE URBAN AREAS, BUT, RATHER, IN THE RURAL COMMUNITIES.

WE, AS REPRESENTATIVES OF THE PEOPLE, HAVE A RESPONSIBILITY TO MAKE CERTAIN THAT THESE AREAS CONTINUE TO GROW. FINANCIAL INSTITUTIONS MUST RECOGNIZE THAT THE RURAL COMMUNITIES ARE AREAS WHERE THEY MUST MAKE ALL OF THEIR SERVICES AVAILABLE.

MR. CHAIRMAN, I THANK YOU FOR THIS OPPORTUNITY TO TESTIFY.

Senator D'AMATO. Mr. Partee, when we talk about the bubble bursting, kind of a washing out effect, what about the long-range implications?

We see, and I think a lot of it is due to social phenomena, the disappearance of the more traditional family farm. Will that continue, in your opinion, to be a thing of the past?

And second, will there come a point in time when the prices will then stabilize and, if anything, maybe we see them beginning to appreciate?

Mr. PARTEE. Yes, I think that farm prices will hit bottom. I don't know that they have hit it yet. But, as I reported earlier, we still have been having a decline in farm product prices this year. And the information from the Midwest is that farmland values have declined sharply in the past year in places like South Dakota, Nebraska, Kansas, Iowa, and Illinois on the order of 20, 25 percent.

So that I don't know if we have reached it yet, but it will, of course, equilibrate at a point where the commercial return will support a price for the land that is consistent with that value and you might even get a little bounce back then at that point.

My understanding is that the rental value of land in the Midwest in most places is about 6 percent of current market, which still sounds low to me. So I'm not sure that we've hit bottom.

So far as the family farm is concerned, I do believe that the trend has been quite inescapable for a century, that the number of family farms and people depending on farming for their main livelihood has been on the decline. And I would expect it to continue.

A lot of people live on farms. And, you know, when we go through the statistics now, we segregate what we call commercial farms from other farms because there are a lot of quite smallish farms where people live on the farm and work in the town and just farm a few acres sort of part time. And that, I think, is going to continue and probably increase.

But reliance by a family on farming as the sole occupation is, I think, still on the decline and technology and all that suggests to me that that will continue.

Senator D'AMATO. Mr. Chairman, just one other question and we may be going a little far afield, but I've had the opportunity of having Mr. Partee before us in the Banking Committee and have always appreciated his insights, not only as it relates to the Reserve, but also in areas sometime that are tangential.

If the trade policies and the trade imbalance continues as it relates to farming, with the United States getting a decreasing share of the world market, have you done any analysis with respect to what this impact will be on the farming community on rural America?

Mr. PARTEE. Well, I think that the rise in the value of the dollar from 1980 on was a proximate cause of some difficulty in competing in the export market and that it probably was of considerable harm to particular farmers. Maybe soybeans and corn and, you know, some things, wheat, not everything, but some kinds of farming activity.

Now the difficulty, as I noted in my statement, Senator, the difficulty is that farm production has increased quite substantially in a good many other countries than this.

A few weeks ago, I met with some of the people from the Bank of China and they reported proudly that they were now self-sufficient in food in China.

Now that's a strange place to expect that that would be so, but I think it's characteristic of a tendency in recent years for the LDC's, in particular, to emphasize food production and they've been pretty successful with it.

If that's so, then I have a little difficulty in seeing how a drop in the dollar now is going to bring back those farm markets because I think the first use of food will be of domestically produced food in all of those countries.

Thus, we have a fundamental imbalance in supply and demand. A lower dollar, if it develops over time and, as you know, we've been thinking that it would, will be of marginal help to farmers. But I don't think it's going to be a solution to the problem for American agriculture.

Senator D'AMATO. So would it be fair to say that given the increased production, with such examples as China and Brazil, we have other nations that have increased dramatically their production in areas of farming activity that were heretofore almost exclusively within the capacity of the United States to produce, to export to other nations—soybeans, et cetera.

That no longer being the case, it would appear to me that there are many more economic problems on the horizon for the agricultural industrial base or the agri-base of the United States.

Mr. PARTEE. Yes; we don't see any near-term change in the condition as a generality. Now, if you had a major drought or something, that could change conditions.

But short of that, why, there doesn't seem to be anything on the horizon that will greatly improve the total marketing capacity of agriculture. Therefore, it may be a fairly long time.

Now, I would point out to you that we economists never can see very clearly into the future. It was not much more than——

Senator D'AMATO. You're one of the few economists who's ever admitted that. [Laughter.]

Mr. PARTEE. That's because I'm no longer an active economist.

Senator D'AMATO. I see. [Laughter.]

Mr. PARTEE. You can't afford to do it when you make your living being an economist. [Laughter.]

But I would point out that it wasn't much more than a decade ago that the thought was that there was going to be a perennial food shortage in the world.

You remember the Rome conference and zero population growth and all that? Now that wasn't so awfully long ago. And now here I am sitting here and telling you that there is no near-term prospect of a turnaround that would take our farm product off the market.

That could be wrong.

Senator ABDNOR. I'd just like to add to that. I'm a farmer and all my life I waited for that day they said we were going to eat our way out of that surplus. [Laughter.]

It never did come about. We've got to move on. Do you think that any country could really compete with us in grain sales if the trade barriers weren't there and if we really wanted to outsell them?

That's the trouble. Good old Uncle Sam. We never want to infringe on other countries.

If we got the budget in line and we got the dollar down—do you think we could compete? Do you see that day when we could go out and compete and survive? I guess that's the word because if we don't sell, we're not going to survive.

Mr. PARTEE. Well, yes, I think our conditions would improve. Our export conditions would improve if the dollar were in line. The point I was making, Mr. Chairman, is that so far as I know, the productivity of the new farming developments abroad is reasonable. And I would think that there would be, since the dollar is always a sure currency for most of these countries, there would be a tendency to use the domestic production first.

So you'd have to have a drop in the price of, say, wheat to the point where China would decide that it was better not to produce its own wheat, but to buy it from us. And since dollars are short to China, I think that's a hard decision for them to make. Or for Brazil. Or for the LDC's, in general, who tend to be very short on foreign exchange.

The point I was making to Senator D'Amato was simply that once we have this production capacity, it's not going to be easy to see it retired from use. Just as in the United States, we almost never retire an acre of farm land unless we put a house on it or something like that.

Senator ABDNOR. Well, I appreciate your help today. Senator D'Amato has some additional questions. I have a lot more I'd like

to ask you, but I know we can't for lack of time. We have some very fine testimony coming before us on this subject, so we'd better move on.

Mr. Partee, we thank you very sincerely for appearing here today. If you don't mind, if some other questions come up, we will submit them to you in writing and hope you'll respond to them. Thank you very much.

Mr. PARTEE. Thank you.

[Pause.]

Senator ABDNOR. Our next panel will be Mr. Irwin, Mr. Killebrew, Mr. Gerhart, Mr. Shaffer, and Mr. Meadows, in that order. If you haven't all met each other, please take a few seconds to get acquainted here.

We're delighted to have all you gentlemen. Mr. Irwin is the Chief Economist for the Farm Credit Administration. Mr. Randall Killebrew is president of the First National Bank of Petersburg, IL, and particularly, you're chairman of the Community Bankers Council. Mr. Bud Gerhart is the president of the First National Bank of Newman Grove, NE. He's chairman of the agricultural rural committee, Independent Bankers Association of America. Mr. Ron Shaffer from the University of Wisconsin. And Mr. Dave Meadows, Associate Director of the Division of Bank Supervisors of the FDIC.

This is a very illustrious group of experts that we have here. We have gotten off to a good start. I am sure you listened to Mr. Partee as we looked at it from his view. Now we're anxious to hear from you.

Mr. Irwin, would you care to start off?

STATEMENT OF GEORGE D. IRWIN, ASSOCIATE DEPUTY GOVERNOR AND CHIEF ECONOMIST, FARM CREDIT ADMINISTRATION

Mr. IRWIN. Thank you, Mr. Chairman. I'm George Irwin, Chief Economist with the Farm Credit Administration. It's a pleasure to appear before you, but it's a real challenge to deal with that list of topics you had on your agenda. [Laughter.]

Fortunately, about a month ago, I made a presentation to a Federal Reserve Bank conference in Chicago, and I have appended that to my prepared statement, since it does touch on most of those issues.

Senator ABDNOR. Good. That will be made part of the record. I want you all to know that your entire statement and attachments you're submitting will be included in the record.

Mr. IRWIN. What I want to do here this morning is just summarize the main points from that more detailed analysis and then comment on three specifics that I know are of a great deal of interest to you.

The main point I was making is that for the second time in the 20th century, we have a major structural adjustment underway in agriculture under stress conditions and that's what's causing problems for both farmers and for financial institutions that deal with them.

We are in the process of adjusting to a position where the optimum amount of leverage for a farmer is less. There are some that are not going to make it through this adjustment. Those who are

going to make it, both farmers and financial institutions, have a number of difficult problems to deal with in making their adjustments.

What I'm going to deal with here today are the question of stabilizing asset values, something about the financial performance of the Farm Credit System, and something about the interest rate charges to borrowers from the Farm Credit System.

First, on the subject of asset values, we feel that there is a significant threat that we could get some disorder in agricultural real estate markets in a number of areas of the country. There is a possibility of a temporary glut in the amount of land coming on the market in some areas, and it could drive prices below what would be an equilibrium position.

What you do then is destroy the survivability potential for farmers and for their financial institutions when they would otherwise be viable for the long run.

I think that not only do we have the problem of a potential land supply excess for a short period of time; we have the problem that the dollar value is probably overadjusted and the interest rate is probably higher than makes sense for the long run, and both of those factors in addition tend to place temporary downward burdens on the land market.

Something like this affects the balance sheet of all farming operations, and it's potentially possible that the actions that have to be taken with the overextended farmers, who have to liquidate, are enough to create kind of a whirlpool effect to suck in some others who are on the periphery of being viable.

It's obviously a lot more difficult for an ag creditor to stay with a borrower in this kind of a situation and the availability of ag credit is directly affected by collateral being eroded in this way.

While this obviously affects the private interest of both farmers and lenders, we think that there is some public policy interest in this issue also. The events which are now underway threaten to increase the extent of structural adjustment that actually takes place beyond what might otherwise happen. We just suggest that Congress may want to consider measures that would cushion excessive drop in land prices. We think the objective is not to prop them above any equilibrium realistic long-run level. You can't really do that. The objective is to prevent chaos from prices temporarily dropping substantially below economically justifiable levels.

There have been a number of specific proposals, including one approach by the Farm Credit Council, which is the trade association for the Farm Credit banks. We in the Farm Credit Administration have not specifically endorsed this or any other specific proposal, but we do agree with the objective that there may be a public interest in somehow providing some bottom-side stability on the land market.

Second, financial performance of the Farm Credit System. The institutions of the Farm Credit system have historically unprecedented levels of losses in the last year, and they're having to develop tools to absorb those losses while they're attempting to manage and control the financial crisis.

We already have situations where two of the Federal intermediate credit banks are needing assistance from other banks. We have had some 11 PCA'S fail and about 50 mergers in the last year.

We have done a rather extensive analysis of this, and we continue to believe that the System has the financial capacity to pull itself through if they take prompt action to bring their System reserves to bear on this problem and if we don't get any major new economic adversities to blindsides them. Obviously, this is going to require some major adjustments for them to do so.

We're in a period where the System is facing quite a bit of institutional innovation just as our friends in the commercial banking business are.

Ultimately, there may be some legal questions, questions of structure in the Farm Credit System, which the Congress may need to address, including the appropriate tools for the System institutions to share their losses, the accountability of separate banks to the entire System, and the general structure of banks and associations.

The difficulty in dealing with each of these is the very strong desire of the owners, the borrowers of the Farm Credit System, to maintain their grassroots control, and their desire to protect their individual institution, if it happens to be strong, from having to carry too much burden from the weaker institutions.

Let me next comment a little bit on interest rates charged to borrowers.

There's a really inherent dilemma for a lending institution trying to stay with a financially stressed borrower. The dilemma is that you impose a cost on healthy borrowers and may imperil some of those in the process. If you're keeping interest rates as low as possible to aid stressed borrowers, you may produce financial weakness in the lending institution and then that forces substantially higher interest rates affecting everybody whose loans are performing.

And let me just comment that the December 31, numbers show that a bit over 93 percent of the loan volume in the land banks is performing—that is, making its payments on time—and just about 90 percent of the PCA volume is. So you've got well over 90 percent on the performing side and something about 10 percent or less on the difficulty side.

While forbearance has been a popular word in the last 4 or 5 years and it's been a long-time policy of the Federal Farm Credit Board, it says that you go along as long as there's a reasonable likelihood that a farmer can work his way out. We joined the depository institution regulators this last spring in the statement encouraging our examiners to deal with that kind of a situation appropriately to help the individual survive.

But you have to recognize that forbearance has its limits. Our Federal Farm Credit Board, who set the general policy, has recognized the need to balance three competing interests—there is the troubled borrower; there's the sound borrower; and then there's the person who invests in the securities that provide the funds for the System in the first place.

Staying with borrowers has meant that the System has had increased losses. These translate into higher interest rates. Recently,

the land banks and the PCA's have faced this kind of a situation, in some cases interest rates have gone above those charged by the commercial bankers. We've had a loss of customers and further increases of the burden of the remaining performing loans carrying the ones that are not performing.

A parallel problem occurs in a borrower-owned system, such as the farm credit system, and that's the retirement of capital stock as these good loans go away. It weakens the association's capital position. And you're undoubtedly aware that the Omaha Farm Credit district has put some restrictions on the automatic retirement of stock in order to help protect against this kind of a situation.

I think we need to note specifically why some of the system institutions are raising their rates right now.

Since they are privately and cooperatively owned and do not receive either Federal funds or Federal guarantees, they're dependent on the sale of securities in financial markets. What it costs to borrow from the farm credit system is the cost of these portfolios of securities plus the cost of operating expenses, which increasingly have included the reserves required to cover losses and require income to cover nonperforming loans.

It's sort of an anomaly recently that we've had announcements of higher interest rates in some of the farm credit banks at the same time market rates for new security sales are going down, a very difficult problem for borrowers to understand.

The problem, of course, is the operating costs are going up because of nonperforming loans, the same problem that the rural bankers are having that Mr. Partee was discussing.

In order to keep these institutions financially stable for the rest of their borrowers, it's necessary to maintain these loss reserves, and in order to maintain access to financial markets, it's necessary to maintain the net earnings of the financial institutions.

This is a very difficult kind of a thing to try to do because all the borrowers, including the ones that are on the boards of directors, have a strong desire to keep rates down as best they can. They have been doing that for the last year or so. The results have caught up with them, and they are, therefore, now having to raise rates in order to keep themselves healthy.

What this really demonstrates is it's the farmer who is in sound position who ends up carrying the burden of other farmers who are unable to pay their loans.

What interest rate these institutions actually charge is their own business judgment. They have to weigh the dangers of losing borrowers to somebody else against maintaining the financial soundness of their institution.

We in the Farm Credit Administration, sitting as a regulator interested in being sure that the system is safe and sound, have put a great deal of emphasis on the system's need to show adequate earnings in order to maintain investor confidence and be able to sell securities at the lowest possible rate because, after all, the interest cost of securities is the single biggest factor in the cost of loans to farmers.

Congress established the Farm Credit System to provide some continuing mechanism to meet the needs of farmers and related

groups and their cooperatives. And as we sit in the regulatory slot, we think that we have to balance the interest of protecting investors, protecting current borrowers, and protecting the survival of a system for those borrowers who are going to be there in the future.

Thank you, Mr. Chairman. That concludes what I had to say.

[The prepared statement of Mr. Irwin, together with the attachments referred to, follows:]

PREPARED STATEMENT OF GEORGE D. IRWIN

Mr. Chairman, my name is George Irwin. I am an Associate Deputy Governor and Chief Economist of the Farm Credit Administration. I am pleased to have this opportunity to appear before the Joint Economic Committee to discuss several aspects of rural finance. On May 2-3, I presented a paper at a Conference on Bank Structure and Competition sponsored by the Federal Reserve Bank of Chicago, which specifically addresses almost all the topics on this committee's agenda today. I would like to submit a copy of that paper as part of my testimony and concentrate my comments this morning on three key points:

Need to Stabilize Asset Values

Financial Performance of the Farm Credit System

Interest Rates Charged FCS Borrowers

Need to Stabilize Asset Values

There is a significant threat of disorder in agricultural real estate markets in a number of areas. A temporary glut in land offered for sale could drive prices far below an equilibrium position. The financial survivability of farmers and, therefore, financial institutions, which are otherwise viable for the long run, would be significantly imperiled. Moreover, land values affect the balance sheets of all farming operations, and actions of overextended farmers who must liquidate all or part of their land holdings can create a whirlpool, sucking down others on the periphery of viability.

In addition, the reduction in land value has made it far more difficult for agricultural creditors to stay with borrowers. They often have to take over and resell land when borrowers are unable to repay their loans, and their own financial resources become imperiled. The availability of agricultural credit is directly affected, because collateral security of agricultural land becomes a more critical factor in situations where cash-flows are weak.

While private interests of both farmers and lenders are affected directly, public policy interests are affected as well. Events now in progress threaten to increase the extent of structural adjustments in agriculture, reducing the number of farmers and doing extensive harm to the credit delivery system. We believe that Congress needs to consider measures that would cushion the drop in land prices, especially in areas of the country where large amounts of farm land are on the market or are likely to come onto the market, and where there is the threat of a collapse of land prices. The objective is not to prop land prices above realistic long-run levels, but to prevent chaos should they substantially drop below economically justifiable levels.

Federal involvement to cushion land prices could be achieved through a low net cost program of temporarily holding land off the market to permit prices to stabilize. One approach that has been proposed by The Farm Credit Council, a trade association representing the interests of the banks and associations that constitute the Farm Credit System, calls for establishing an Agricultural Conservation Corporation. The corporation

would be a joint, public-private mechanism to purchase loans that commercial lenders would otherwise be forced to liquidate, thus possibly glutting asset markets (land and other agricultural assets) and further depressing their prices. The Farm Credit Administration has not endorsed this or any specific plan, but we agree with the underlying objectives of The Farm Credit Council proposal.

Financial Performance of the Farm Credit System

System institutions are experiencing historically unprecedented loss levels and are having to develop tools for absorbing the losses while attempting to manage and control the financial crisis. The 37 System banks have undertaken efforts to assist two Federal intermediate credit banks that need an infusion of additional funding in order to continue to operate.

The Farm Credit Administration continues to believe that the banks and associations that constitute the Farm Credit System have the financial capacity to assist individual System banks that are experiencing serious financial difficulties if prompt actions are taken to bring System reserves together to bear on the problem and if no major new economic adversities strike. Major structural adjustments will be required as Farm Credit System institutions seek to do so.

The Farm Credit System encompasses 12 Federal land banks, 12 Federal intermediate credit banks, and 13 banks for cooperatives, as well as

430 Federal land bank associations and 370 production credit associations. Each institution is a private corporation, cooperatively owned by its member-borrowers. There is no central loss reserve, no central capital, and the framework of joint activity that exists in law is very limited. However, the 37 banks issue Systemwide securities, and the law provides that all the banks must stand behind each security issued.

New devices are being developed to address the problem. The FCS is facing a period of institutional innovation as it seeks to accommodate its structure to deal with the financial stresses that make its member institution interdependent. Ultimately, it may be desirable to address the legal structure of the Farm Credit System, including the tools to appropriately share losses, accountability of separate banks to the System as a whole, and the general structure of banks and associations. Change must consider the desire to maintain grassroots control of System institutions and to insulate institutions that are financially strong from having to carry the burden of weaker institutions.

Interest Rates Charged Borrower-Members

There is an inherent dilemma that lending institutions face when they try to stay with financially stressed borrowers. It is the cost imposed on other healthy borrowers. The dilemma is that keeping interest rates as low as possible to aid stressed borrowers may produce financial weakness in the lending institution, which will result in significantly higher interest

rates in the future. "Forbearance" has been the policy of the Federal Farm Credit Board, encouraging System lenders to go as far as possible where there is a reasonable likelihood that a farmer can work his way out of trouble and return to a fiscally sound agricultural operation. However, forbearance has its limits. The Federal Farm Credit Board members, who are appointed by the President to set policy for the Farm Credit Administration, have stated that there is a

need to balance the interests of troubled borrowers, sound borrowers, and investors in System securities, in light of its statutory mission to provide a reliable continuing credit source. . .

Staying with borrowers has meant that the System has experienced increased losses, and these losses are translated into higher interest rates for the stronger borrowers. The Farm Credit Administration is now hearing from a number of land bank borrowers who are complaining about increases in interest rates of Federal land banks (FLBs). We have also heard from PCA borrowers in districts where financial assistance programs have been triggered. In some cases, the result has been to drive interest rates above those charged by commercial banks, the loss of some good customers, and further increases on the burden of performing farm loans in carrying nonperforming assets. A parallel problem is the retirement of capital stock, which has the direct effect of weakening the association's capital position and which has triggered the recent action by the Omaha Farm Credit District by eliminating automatic stock redemption. It is helpful to review how the System sets interest rates and why they are being forced to raise those rates. .

FLBs and PCAs are private, cooperatively owned financial institutions. Although federally chartered under the Farm Credit Act of 1971, as amended (the Act), they do not lend or receive any Federal funds or guarantees. Rather, they obtain their funds through the sale of securities in the Nation's financial markets. The rates charged reflect the cost of borrowing through the financial markets and operating expenses, including periodic additions to reserves for loan losses.

The recent announcements of higher rates are occurring at a time when market rates for new security sales are generally declining. This anomaly is caused by the costs of carrying nonperforming loans of borrowers experiencing financial difficulty and losses incurred on some of those loans.

In order to keep System institutions financially stable it is necessary to maintain loss reserves by contributions from gross income. In order to preserve investor confidence, it is necessary for FLBs to price loans at a level that will result in at least maintaining net earnings. The System's Finance Committee, which is responsible for pricing the System's securities, has set a 0.75-percent return on investment as a minimum reasonable return by banks in order to sustain investor confidence. This has been very difficult to achieve because of the strong desire of stockholders to minimize current rates.

It is important to emphasize that the increase in interest rates, in reflecting the cost of loan losses, demonstrates that it is the sound

farmer who is being asked to carry the burden when other farmers are unable to repay their loans. System efforts to stay with farmers who are experiencing financial difficulties has its direct costs in lower returns on investments, the need for larger loss reserves, and ultimately for higher interest rates to all borrowers.

The interest rate charged by lending institutions is ultimately a business judgment that must weigh the dangers of losing borrowers to lenders charging lower interest rates against the financial soundness of the institution. The Farm Credit Administration, as a regulator responsible for ensuring that System institutions are operated on a safe and sound basis, has emphasized the System's need to show adequate earnings in order to maintain investor confidence and sell securities at the lowest possible rates.

Congress established the Farm Credit System to meet the credit needs of farmers, ranchers, producers and harvesters of aquatic products, and agricultural cooperatives. The Farm Credit Administration, as an independent Federal agency regulating, supervising, and examining the institutions of that System, is interested in protecting investors in System securities, in protecting the member-borrowers of the System, and at the same time ensuring that the Farm Credit System has the capacity to provide the necessary credit needs of the agricultural community.

Summary of Comments on
The Role of the Farm Credit System¹

George D. Irwin
Associate Deputy Governor and Chief Economist
Farm Credit Administration

Congress has provided for a number of federally chartered financial corporations while reserving to the states the responsibility for chartering most other types of corporate businesses (as well as a dual role in chartering some kinds of financial institutions). The cooperative Farm Credit System (FCS), along with national banks, federal savings and loans, and federal credit unions are important examples. Each was created to achieve some unique national purpose, and each was provided certain charter characteristics to enable it to succeed in that purpose. The Farm Credit Act specifies the purpose of "farmer- and rancher-borrowers' participation in the management...of a permanent system of credit for agriculture which will be responsive to the credit needs of all types of agricultural producers having a basis for credit..."

Major changes in financial structure and in the agricultural sector are necessitating adjustments in the FCS. Mergers, joint managements, assistance for stressed institutions, attention to capital and earnings, and structures for joint action are being considered. These constitute another major step in the evolution toward a full private national business. Such fundamental issues are being confronted at the same time as extraordinary efforts are required to manage short-term financial stress.

The Farm Credit Administration, as the Federal regulator of the Farm Credit System, has the overriding objective of ensuring that a viable FCS continues to exist to serve the borrowers who will survive the current agricultural and financial sector changes.

¹ Presented to Conference on Bank Structure and Competition sponsored by the Federal Reserve Bank of Chicago, May 2-3, 1985.

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The Role of the Farm Credit System
 George D. Irwin*

Introduction

For the second time in the 20th century, the U.S. farming sector is undergoing a profound transformation under stress conditions. We have seen financial excesses develop as a result of three factors:

- The erroneous expectation that the environment in the 1970s would continue: steadily expanding world demand, constraints on supply expansion, and generally rising agricultural prices.
- The use of agricultural land both as a store of value against inflation and as a speculative investment in the 1970s, with these expected income streams capitalized to the future by some farmers.
- The subsequent, successful, somewhat unanticipated anti-inflation strategy relying almost totally on strong monetary restraint with continued fiscal stimulus. This produced continued high real interest rates, a high exchange value of the dollar, and extreme stress on the export sectors (including agriculture), which are bearing the brunt of the adjustments.

The result is that the optimal degree of financial leverage by farmers for the 1980s is reduced drastically. Many find extreme difficulty in adjusting to the new norm, and some find it impossible.

The cooperative Farm Credit System, composed of financial institutions lending exclusively to the farm sector, and itself conservatively leveraged as a financial organization but high by standards of other sectors, finds these pressures impact immediately and directly on its loan portfolio and its operations. My purpose today is to describe something of the current status of the portfolio, some of the problems, and some of the structural adjustments that are underway. But first I need to provide a bit of background.

FCA and the Farm Credit System

The Farm Credit Administration is the Federal regulatory agency responsible for the Farm Credit System. FCA is independent, like the Federal Home Loan Bank Board or FDIC, in the sense that it reports to a presidentially appointed Board (called the Federal Farm Credit Board), and is not part of a cabinet agency.

*Associate Deputy Governor and Chief Economist, Farm Credit Administration

The Farm Credit System is composed of 37 banks and about 800 local associations that lend and provide related financial services to farmers, farmer cooperatives, and closely related groups. The System is heavily involved in lending to farmer cooperatives, while commercial banks are involved to a lesser extent. The System is also involved heavily in farm mortgage lending, where it has a strong presence compared to commercial banks, and in lending to farmers for shorter term purposes, where the two kinds of institutions compete directly. In the latter, the production credit associations have about half the loan volume of all commercial banks, or less than one-fifth of short-term borrowings of farmers. In the farm mortgage area, Federal land banks provide around 40 percent of loan volume, just slightly more than individual seller financing and substantially more than insurance companies or commercial banks. The banks for cooperatives provide over 60 percent of the debt funds used by U.S. farmer cooperatives. Production credit associations obtain their funds by borrowing from the Federal intermediate credit banks, while Federal land bank associations service loans made by the Federal land banks.

Capital is provided through retained earnings and through the requirement that borrowers own stock in the associations from which they borrow. The System raises most of its funds by selling securities in the so-called agency market. They have no direct or indirect Federal guarantee, but the System has a Federal charter to achieve a public purpose -- providing adequate credit to all segments of commercial agriculture. This fact, combined with the System's financial status, has traditionally caused investors to regard FCS securities as second in quality only to U.S. Treasury securities. The securities of the System are the joint and several liability of all 37 banks, while the capital is actually dispersed among the 37 banks and 802 associations.

Current Status and Recent Performance

Agricultural stress over the past 5 years has created profound impacts on this System, which is forcing some reevaluations of the way it does business. Systemwide loan losses in 1984 reached \$428 million, after accumulating \$261 million in 1983. In the same period, commercial banks suffered agricultural loan losses of about \$900 million, or 2 percent of outstandings. These last 2 years have accounted for a large share of total losses in the 67 years of operation. Eleven PCAs have been liquidated in the past 2 years, and over 50 were merged for various reasons. For comparison, during 1984, 49 commercial banks involved in agriculture were liquidated. One of the 37 banks has received financial assistance from the others and more may be anticipated this year. At yearend, about \$1.8 billion of the \$80.6 billion in loans outstanding was not accruing interest, and another \$5.1 billion was otherwise nonperforming. Some \$542 million in acquired property was being held.

¹ A net of \$80.6 billion is loaned to farmers and farmer cooperatives, while an additional \$16.3 billion are intrasystem FICB loans to PCAs, which then loan to farmers. Of the latter, \$0.3 billion was nonaccrual and \$2.2 billion was nonperforming at yearend.

Despite these facts, which obviously create concern, there are overriding financial strengths. These demonstrate that the System should be able to survive, adjust, and prosper, barring unforeseen major additional problems for the agricultural sector and assuming effective financial actions by the System. The 37 banks were able to generate \$442 million in net earnings in 1984, after provision for losses. The PCAs showed a net loss of \$10.3 million while the FLBAs had a net income of \$47.6 million. Collectively, FCS institutions carried an allowance for losses of \$1.3 billion at yearend. The 37 banks had \$9.2 billion in capital accounts against \$72 billion in securities outstanding. Of this bank capital, \$4.1 billion represents earned surplus. In addition, PCAs have \$3.9 billion of capital, of which \$2.0 billion is earned net worth.

Problems and Symptoms

It should be clear from this background that the Farm Credit System reflects the problems in the farm sector. It should also be clear that the immediate System problems relate to managing these difficulties and correcting any credit practices which may have contributed to them, rather than overall, fundamental financial soundness. Nevertheless, they are very real problems and are likely to foment some major adjustments. Let me list eight of these concerns.

1. Concentration of Problem Loan Accounts. Agricultural loan stress tends to be concentrated in those areas experiencing the greatest gain in asset values during the demand boom of the 1970s and in areas experiencing several successive years of adverse weather conditions. Naturally, this means FCS institutions in those areas are weakened and some have failed. Problems to date have also concentrated in the FICS/PCA part of the FCS, but 1984 saw some weakness on the FLB side for the first time.
2. Visibility of Associations. Lenders, who themselves are highly leveraged, learn quickly that financial adversity develops with only a modest buildup of nonperforming loan assets. The first alternative is to eat into earnings and reserves built up for this purpose, but it soon becomes necessary for nonperforming loans to be carried via higher interest rates on the performing part of the loan portfolios. With competitive limits imposed by a rather liquid commercial banking sector, PCAs lose their ability to perform.
3. Potential Borrower Flight. The passthrough of costs of nonperforming loans leads to noncompetitive pricing and loss of quality customers. In addition, borrowers may leave for a second reason, one that has never before been tested -- the risk of loss of their equity investment in association stock should the association fail. The ability of borrowers to "withdraw" capital by refinancing elsewhere leads to the view of stock capital as secondary to retained earnings.
4. The Cross-Payment Phenomenon. In the beginning years of an economic adversity, borrowers may make payments to the short-term lender by

refinancing against mortgage security. Or, the mortgage lender's payments may be included in the operating line of credit. Both factors keep loans in performing status and delay recognition of or response to financial problems. When the capacity to make further cross-payments runs out, the financial statistics begin to deteriorate rapidly. Data are not yet available for the first quarter of 1985 to assess just how widespread this phenomenon may be.

5. System Liquidity. The underlying liquidity of the FCS has been its high financial rating, combined with agency status in financial markets, which enables it to issue securities whenever funds are needed to support loan volume. In direct form, on December 31, 1984, the 37 Farm Credit banks held \$238 million in cash, \$3.2 billion in investment securities, and \$1.2 billion in lines of credit for liquidity purposes. A pending question is whether the risk of adverse rumors has grown to the point where the System needs to incur the cost of additional liquidity.
6. Variable Lending Rate. Since 1972, most lending has been done on a variable interest rate, tied to average cost of funds to each bank. Rates tend to lag moves by commercial bankers, on both up and down cycles. This results in cyclic shifts in market shares. The unprecedented rise in the level of interest rates has increased customer interest in the rate rise caps, fixed rate programs, or other options. Recently, changes in interest spreads to compensate for nonperforming loans assets has raised some of the same questions.
7. System Earnings vs. Relief to Borrowers. In a borrower-owned System, each downward move in money costs will inevitably produce expectations of a drop in the billing rate. The expectation is redoubled when borrowers are under financial stress, as is the case currently. However, average-cost pricing produces only a partial reflection of change in new money cost into bank funding costs. At the same time, because of the absence of a Federal guarantee, investors must be reassured that System earnings, after provision for losses, are stable, reliable, and preferably growing. The proper balance between the long-term issue of access to investors' funds and the immediate issue of borrower stress is a major management problem. It is difficult to achieve and enforce a Systemwide earnings policy based on concerns and cooperation of local managements.
8. Capital Mobility and Quality vs. Decentralization. With many separate pools of capital, but with joint bank liability to protect Systemwide securities, conflict develops in trying to provide assistance to a distressed financial institution. Although capital preservation and loss sharing agreements exist, they are not always effective ensuring continued viability of an institution. Nearly half the capital is in the form of borrower stock. The local nature of ownership leads to local resistance to such assistance. Borrowers have become especially aware that in their effort to ensure local autonomy in lending, they lack risk control on the other lenders with which they are jointly

lieble. This capital is also less permanent from an investor viewpoint, because loan repayment usually results in retirement of the stock.

Thus the problem is also one of the optimal degree of centralization versus decentralization. These problems have resulted in a slow and complex set of procedures for mobilizing System capital resources whenever financial difficulties arise.

External Pressures

In addition to the cyclic symptoms created by the transition from the expansionist 1970s to the more sober 1980s, longer term sets of forces are creating structural change in the Farm Credit System. These forces, arising in the economic, social, and political changes, are also altering two groups that are vital in any FCS planning: (1) the farmer-customers, which the System will need to serve in the decade ahead, and (2) the competitive organizations that seek to provide financial services to customers in the agricultural finance industry. Although the transitions now underway in the System have been evolving slowly for a decade or more, the stress of the 1980s has hastened the process. Eventually, the System would have to respond in some manner to a more deregulated financial service industry. Eventually, the System would have to respond to an increasingly bimodal set of customers demanding different kinds of services -- part-time vs. large commercial farmers. But the timetable has definitely accelerated as a result of current conditions.

Structural Changes

Part of the responses to date have been by adjustment in current programs. But much of the attention has been focused on structural solutions. In the past year, we have seen significant numbers of association mergers. Joint management of banks now exists or is planned in 11 of the 12 districts. A number of districts have plans for or are involved in joint management of short-term and real estate lending at the association level. The System has developed a central organization for congressional lobbying, called The Farm Credit Council, a joint services corporation called Farmbank Services, and a jointly owned Farm Credit Leasing Services Corporation. There has been consideration given to more formal and centralized mechanisms for management of capital, liquidity, lending risk, planning, and certain other functions. Other changes under consideration would require changes in the law itself, including mergers where only joint management is now permitted. In recent years, FCA has taken a more clearly hands-off regulatory posture, and legislation has been proposed to give FCA regulatory powers comparable to other financial regulators.

It is not possible at this point to forecast what will evolve. Our purpose in FCA, as a regulator, is to balance the interests of healthy borrowers, troubled borrowers, investors, the general public, and the Farm Credit institutions themselves to ensure that the ag sector continues to have a reliable and adequate source of financing and financial services for the decade ahead. To that end, FCA has participated in evaluating changes in current government programs to assist troubled borrowers and financial institutions, as well as offering counsel about longer term credit policies for the agricultural sector.

While the structural problems of the Farm Credit System will always be unique from those of commercial banking, comparison with the discussion in some of the other sessions of this conference demonstrates that there is a growing degree of commonality. Indeed, they are affected by the same forces, and there is certainly substantial interdependence. I look forward to the opportunity to consider them further during the discussion period.

Senator ABDNOR. Thank you, Mr. Irwin. A lot of thoughts and questions went through my mind as you were speaking, but I want to continue through the rest of the participants on our panel.

We're very pleased to have Mr. Killebrew, who represents the American Bankers Association on rural finance.

Again, Mr. Killebrew, your entire statement will be made a part of the record and you, too, can summarize or proceed any way that you care to.

STATEMENT OF RANDALL A. KILLEBREW, PRESIDENT, FIRST NATIONAL BANK OF PETERSBURG, IL, ON BEHALF OF THE AMERICAN BANKERS' ASSOCIATION

Mr. KILLEBREW. Thank you, sir. Mr. Chairman, members of the committee, I'm Randall A. Killebrew, president of the First National Bank in Petersburg, IL, and chairman of the American Bankers Association's Community Bankers Council.

The combined assets of our members comprise approximately 95 percent of the industry total. Our members range from the smallest banks to the largest banks. Close to 85 percent of our membership have assets of less than \$100 million. I welcome the opportunity to present ABA's view on rural finance.

The incorporated town of Petersburg, which is in west central Illinois, north of Springfield, consists of 3,000 people. And my home county of Menard includes about 10,000. Petersburg has one branch of an out-of-town savings and loan and serves as home for two independent banks. The First National Bank of Petersburg is a \$43 million bank and approximately 35 percent of our loan portfolio is in direct farm production loans.

My hometown and county are in better shape economically than many of the troubled communities of the Midwest and other predominantly agricultural areas, partly because of the better than average production. Good productivity in the past has helped our local farmers overcome some of the difficulty over the last few years.

Agricultural problems have been building for 15 to 20 years, especially when inflation was high and interest rates were low, which led to the strategy of borrow and buy. The dollar was valued at a low level relative to other currencies, contributing to export expansion and good market. Land was the asset to own and more and more land was brought into production as cash-flow needs arose. These artificially prosperous times are analogous to the international lending condition to the extent that excessive lending was done based on prosperous economies and unsustainable low-interest rates. In addition, the cooperative farm system, through the Production Credit Association and the Federal land banks, became aggressive lenders, basing its performance on volumes of loans outstanding.

In the late 1970's, the economic rules changed. First, there was a grain embargo hampering the U.S. reputation as a reliable supplier of agricultural commodities to the rest of the world. Second, there was a basic change in the Federal Reserve policy resulting in limited monetary growth and more volatile interest rates. Consequently, there was a group of less efficient and/or overleveraged farmers

whose operation worked well with high inflation and low-interest rates, but who could not withstand deflation, declining land values, continued high input cost, and historically high real interest rates.

A second, but still significant result of the depressed level of economic activity in small-town business in agricultural areas. In many ways, small business owners have less staying power than farmers because they have less capital and solving their problems can be very difficult.

In summary, it can be said that the past abrupt changes in monetary policy and, to a greater extent, irresponsible financial policy that had a much greater impact on agriculture than any farm policy during that time. This is true when you consider the impact of agriculture of the rapid changes from inflation to deflation, negative real interest rates to historical high interest rates, overproduction based on record exports, and a low-valued dollar to curtailment of exports and a high-valued dollar.

U.S. economy is in the midst of a strong recovery from a deep recession. Overall, the near-term outlook for the economy is positive; but there are significant concerns about the longer term outlook related to our fiscal crisis.

Our association believes that urgent action needs to be needed now to restrain the growth of Federal spending and borrowing. We believe the priority goal of the economic policy should be the achievement of long-term stability. Long-term stability would mean less inflation, lower interest rates, lower unemployment, and more steady, long term real growth and the stabilization and eventual decline in the ratio of Federal debt to GNP. Long-term stability can best be achieved by restraining the growth of Federal spending, thereby allowing more private sector savings, investment, and job creation. We believe the ongoing Senate and House conference to resolve the difference between the budget resolution passed by each Chamber last month will produce important spending reductions.

Mr. Partee and Mr. Irwin, in their statements, outlined very well the problems of agriculture and I will skip over that. And also, Mr. Partee, in his remarks, outlined very effectively the state of agriculture banks at this time.

In attempting to suggest methods of easing the impact of the current agriculture problems on banks with high percentage of agriculture loans, our association has over the past 3 years conducted regular meetings with the chief supervisory personnel of the Federal banking agencies. The focus of these meetings has been on the need for understanding on the part of bank examiners when examining agriculture banks and agricultural borrowers. Although our association would not suggest, and could not support, any generalized moratorium on bank closings, we do believe that given time, many banks will be able to manage their way out of the current difficulties. Meanwhile, we think that there are a few areas in which improvement can be made.

The operation of the Farmers Home Administration must be examined in relation to the whole structure of the country's financial institutions and the credit needs of the agricultural sector of the economy. During consideration of the 1985 farm bill, the ABF recommends that the credit programs administered by the Farmers Home Administration be restructured. Our association believes

that further deregulation in the banking industry should be beneficial to rural banks and rural economies.

Specifically, we support the expansion of the list of permissible bank-holding company activities and congressional authorization for geographic expansion within the spirits of states rights.

Also, we believe that the proposed changes must be tied to the elimination of the nonbank-bank loophole.

All of us as consumers have been sensitized by inflation, which has forced us to seek the maximum possible return on our deposits and the need to obtain in a convenient way a very wide variety of financial products and services. The problem is outmoded laws and regulations essentially limit banks to three lines of business—taking deposits, making loans, and operating the payment system.

While banks remain bound by these limitations, other organizations—Sears, Prudential, American Express, and the scores of others—are pioneering the financial service and service packages that consumers require. This is competition today, but it is not fair or free.

Direct mail and brokerage firms hit the Petersburg area very heavily. The daily paper from Springfield carries ads from such firms, as well as the Springfield thrifts.

Right near my bank, there are both production credit associations and Federal land bank offices. Local automotive and equipment dealers offer manufacturer financing and I mentioned earlier I have a thrift and another bank as competitors in my community.

We believe bank holding companies should be allowed new lines of business—in the field of securities: the offering of mutual funds, the underwriting and dealing in municipal revenue bonds, mortgage-backed securities, and commercial paper; in the field of insurance: underwriting and brokerage; in the field of real estate: equity investments, joint venture, and development and brokerage.

Deregulation, as advocated by the ABA, would diversify banking not only in terms of products and services offered, but in terms of geographic location. Diversification would spread risk, generate new sources of earnings and over the long term strengthen the capital base. All three are necessary.

Spreading risk means operating in more than one or a few lines of business. When this happens, earnings in one area can cushion the impact of the downturns in other areas, including agriculture. Spreading risk further by operating in more than one limited geographic area strengthens the equation even more—when one local economy suffers a setback, earnings derived from other operations in the communities allow the business process to continue unimpeded.

New sources of earnings also help to balance the net interest margin squeeze that has been created by deposit interest rate deregulation, again strengthening safety and soundness.

The ultimate importance of earnings—over and above paying shareholders a return sufficient to assure future access to new capital—is that earnings can be applied to capital and set aside in reserve accounts, which is the first line of defense of the industry's safety and soundness.

The ABA also believes that consumers would benefit from the expansion of banking products and services and geographic expansion.

sion. These benefits fall in three areas. First, the consumer would receive direct, tangible benefits in the form of lower prices for financial services—price reductions driven by increased competition. Second, consumers would benefit by having more and better financial services and products available to them. Third, deregulation would allow banks to put technology to work for consumers, providing a wide range and high quality of services.

But laws and regulations are blocking the road to progress.

The American Bankers Association supports the goal of reducing Government's role in agriculture. Nevertheless, with today's fragile agricultural economy, any rapid and major shift to market orientation, or significant decline in price and loan support levels would be disastrous, especially in the central grain-producing States.

Farmers, agricultural suppliers, and creditors must be given time to adjust to the current environment of deflation of assets, high real interest rates, and the overpriced dollar.

We believe our proposed changes would help, but the best way to achieve a sound farm economy over the long term is through lower interest rates and a more realistic international exchange rate. We believe the overvalued dollar, which appreciated by almost 15 percent last year, and high real interest rates, precipitated by runaway spending by the Federal Government, are the primary problems.

Some agricultural issues will be addressed in the 1985 farm bill. But the most important issues remain with the overall congressional budget, authorization, and appropriation now underway. We believe that a consistently sound monetary policy combined with an effective policy for controlling the Federal deficit are necessary to strengthen the agricultural sector.

Thank you for this opportunity to testify before you today.

[The prepared statement of Mr. Killebrew follows:]

PREPARED STATEMENT OF RANDALL A. KILLEBREW

Mr. Chairman and members of the Committee, I am Randall A. Killebrew, President of First National Bank in Petersburg, Illinois, and Chairman of the American Bankers Association's Community Bankers Council. The combined assets of our members comprise approximately 95 percent of the industry total. Our members range from the smallest to the largest banks, and close to 85 percent of them have assets of less than \$100 million. I welcome the opportunity to present ABA's views on rural finance.

The incorporated town of Petersburg, which is in west central Illinois north of Springfield, consists of less than 3,000 people, and my home county, Menard, includes about 10,000. Petersburg has one branch of an out-of-town savings and loan and serves as home for two independent banks. First National Bank has \$43 million in assets, and approximately 35 percent of its loan portfolio in direct farm production loans.

My home town and county are in better shape economically than many of the troubled communities of the Midwest and other predominately agricultural areas, partly because of better-than-average production. Good productivity in the past has helped local farmers overcome the difficulties of the last few years.

The performance of the farm economy impacts more banks than many people realize. There are some 5,000 to 7,000 out of the 14,500+ commercial banks that qualify as agricultural banks. The agricultural economy contributes over one-fifth of the U.S. GNP considering both the direct and indirect impact of the industry. In many communities, the farm dollar is the first dollar of income to begin through the economic cycle which multiplies the income several times over. Agriculture is a significant creator of new real wealth year after year and it is a major contributor to our national balance of trade.

It is not unusual to hear about farm problems. In most cases, these problems are corrected by normal economic cycles in the farm economy which cause

the industry to rebound and recover. However, this time we have some structural changes occurring within the agricultural industry that normal economic cycles will not correct without massive social and economic dislocation. These problems threaten the existence of a significant percentage of farms and an unknown, but growing number of agricultural-related banks.

Background

Agricultural problems have been building for 15 - 20 years, especially when inflation was high and interest rates were low which led to a strategy of "borrow and buy." The dollar was valued at a low level relative to other currencies, contributing to export expansion and good markets. Land was the asset to own and more and more land was brought into production as cash flow needs arose. These artificially prosperous times were analogous to international lending conditions to the extent that excessive lending was done based on prosperous economies and unsustainable low interest rates. In addition, the Cooperative Farm Credit System, through its Production Credit Associations and Federal Land Banks, became a very aggressive lender, basing its performance on volume of loans outstanding.

When the strategy of "borrow and buy" got individuals into financial difficulty, further inflation, price support programs by the Federal Government, or Farmers Home Administration credit was there to save the day. In fact, up to 1980, few farmers failed because there were so many safety nets in place.

In the late 1970's, the economic rules changed. First, there was a grain embargo, hampering the United States' reputation as a reliable supplier of agricultural commodities to the rest of the world. Second, there was a basic change in Federal Reserve policy resulting in limited monetary growth and more volatile interest rates. Consequently, there was a group of less efficient and/or overleveraged farmers whose operations worked well with high inflation and low

real interest rates, but who could not withstand deflation, declining land values, continued high input costs, and historically high real interest rates.

A second, but still significant result is the depressed level of economic activity in small town businesses in agricultural areas. In some ways, small business owners have less staying power than farmers because they may have less capital, and solving their problems can be tougher. For example, while a farmer may be able to come back from a difficult period by planting a small amount more, it is hard for a banker to advise a merchant to increase sales.

In summary, it can be said that past abrupt changes in monetary policy, and to a much greater extent, irresponsible fiscal policy, have had a much greater impact on agriculture than any farm policy during that time. This is true when you consider the impact on agriculture of the rapid changes from inflation to deflation, negative real interest rates to historically high real interest rates, overproduction based on record exports (a low valued dollar) to a curtailment of exports (high valued dollar).

The U.S. economy is in the midst of a strong recovery from a deep recession. Overall, the near-term outlook for the economy is positive. But there are significant concerns about the longer term outlook related to our fiscal crisis.

Our Association believes urgent action is needed now to restrain the growth of federal spending and borrowing. We believe the priority goal of economic policy should be the achievement of long-term stability. Long-term stability would mean less inflation, lower interest rates, lower unemployment, and more steady long-term real growth and a stabilization and eventual decline in the ratio of federal debt to GNP. Long-term stability can best be achieved by restraining the growth of federal spending, thereby allowing more private sector savings, investment, and job creation. We believe the ongoing House-Senate

conference to resolve the differences between the budget resolutions passed by each chamber last month will produce important spending reductions.

The Current Situation in Agriculture

Let me analyze the current agricultural situation from 4 vantage points: farm assets, borrowing capacity, cash flows and agricultural exports.

Farm Assets

Because real estate constitutes about 75 percent of total assets, changes in the value of farmland dominate all other changes on the asset side of the balance sheet. Farm sector assets have been decreasing since January 1981, and financial stress in the agricultural sector is at its greatest level since before World War II. This point was confirmed by recent figures released by the U.S.D.A. stating that farm values declined by an alarming 12 percent in 1984, the greatest decline since the Great Depression. For example, land in central Illinois that sold for \$4,000 an acre in 1981 is difficult to sell at \$2,500 per acre today. The average reduction in the price of farm land in the Midwest has been 30-40 percent during the past three to four years.

Borrowing Capacity

During the early 1980s, farmers borrowing capacity diminished as a result of the declines in farmland values, high interest rates, and low real farm income. Ample funds are available to credit-worthy farmers. However, once again, farmland values have made it more difficult, if not impossible, for highly leveraged farmers to obtain loans. As these farmers find it more difficult to finance their activities, they will be forced to liquidate part or all of their assets just to survive. This will inevitably force a re-allocation of assets that will continue to erode asset values.

Cash Flows

As the cost/price situation intensifies and the leverage ratio dramatically increases, farm operators are facing more severe cash flow problems. From my perspective, those efficient and productive farmers who are cash flowing at 110 percent are presently my quality borrowers and I will continue to loan them operating and other necessary capital without government assistance.

Agricultural Exports

Since 1980 and 1981, when U.S. agricultural exports peaked in volume and value, U.S. agricultural exports as a percent of total U.S. exports have declined. To put this into context, in 1973, agricultural exports accounted for 25 percent of total U.S. exports, whereas in 1983 agricultural exports totaled only 18 percent of our total exports. Several factors, namely the strength of the U.S. dollar, foreign debt burdens and the underlying declines in incomes of developing countries, excellent weather conditions, and a worldwide recession, have contributed to markedly reduced agricultural exports.

Current Condition of Rural Banks

Let me also analyze the current condition of agricultural banking from 4 vantage points: delinquent loans, loan losses, problem banks and U.S. bank failures.

Delinquent Loans

Data as of December 31, 1984 indicate that agricultural banks, defined as those banks with agricultural credits comprising 25 percent or more of total loans of the bank and less than \$500 million in assets, had a larger percentage of their loans delinquent as opposed to other small banks. This was not true three years ago prior to the agricultural crisis when loan delinquencies at agricultural banks were lower than at other small banks.

Loan Losses

The relative loan losses (net charge-offs) and provision for possible loan losses rose at agricultural banks during 1984, reaching levels that significantly exceeded loss rates at other small banks. The loan loss experience at agricultural banks was 1.22 percent of total loans. This figure exceeded the loan loss experience at other small banks by more than half a percent.

Problem Banks

The number of problem banks reported by the FDIC have increased over the last decade. But the significant increase in the number of problem banks has occurred during the last three years, as shown below.

| Number of Problem Banks | | | | | |
|-------------------------|-------------|-------------|-------------|-------------|-------------|
| <u>1970</u> | <u>1974</u> | <u>1978</u> | <u>1982</u> | <u>1983</u> | <u>1984</u> |
| 252 | 183 | 342 | 369 | 642 | 828 |

U.S. Bank Failures

Until recently, agricultural banks were underrepresented among failing banks. For example, out of the 10 bank failures in 1981, only one was an agricultural bank. However, out of the 79 bank failures that occurred in 1984, 32 were agricultural banks. As shown below, the number of bank failures closely parallels the rapidly increasing number of problem banks among agricultural banks since 1983.

| Number of U.S. Bank Failures Averaged Five Year Increments, Then Selected Years | | | | | | | |
|--|----------------|----------------|----------------|-------------|-------------|-------------|-------------|
| <u>1961-65</u> | <u>1966-70</u> | <u>1971-75</u> | <u>1976-80</u> | <u>1981</u> | <u>1982</u> | <u>1983</u> | <u>1984</u> |
| 6.6 | 6.4 | 6.8 | 9.8 | 10.0 | 42.0 | 48.0 | 79.0 |

As the number of problem and failed banks continues to increase, confidence in the nation's banking system is eroded. Not surprisingly, the bulk of today's troubled banks have a high percentage of agricultural loans.

Proposed Changes

In attempting to suggest methods of easing the impact of current agricultural problems on banks with a high percentage of agricultural loans, our Association has, for the past three years, conducted regular meetings with the chief supervisory personnel of the federal banking agencies. The focus of these meetings has been on the need for understanding on the part of bank examiners when examining agricultural banks and agricultural borrowers. Although our Association would not suggest and could not support any generalized moratorium on bank closings, we do believe that, given time, many banks will be able to manage their way out of the current difficulties. Meanwhile, we think there are a few areas in which improvements should be made.

Farmers Home Administration

The operation of the Farmers Home Administration (FmHA) must be examined in relation to the whole structure of this country's financial institutions and the credit needs of the agricultural sector of the economy. During consideration of the 1985 Farm Bill, the ABA recommends that the credit programs administered by the FmHA be restructured.

Any federal credit activity involves a subsidy and the costs of subsidies are borne by the taxpayer.

The insured loan program of FmHA is much more dependent on government funding and commands more of a subsidy than does the guaranteed loan program where the loans are provided by private lenders. We believe more of each year's

appropriations should be used for loan guarantees in lieu of direct lending by FmHA.

Three major issues need to be resolved in the guarantee program: the timely processing of guarantee loans, the consistent application of FmHA regulations at the state and local county levels, and a commitment by FmHA to honor the guarantee in the event of default. Deputy Under Secretary of Agriculture, Kathleen Lawrence, has agreed to participate in an agricultural commercial lenders task force to reevaluate the FmHA guarantee and address our concerns. Let me highlight in more detail the issue of confidence in the FmHA guarantee.

In order to remove the lack of confidence in the FmHA guarantee in the event of default, we believe that procedures must be modified for more expeditious payment with fewer complicating restrictions. The common perception that guarantees through FmHA are not collectable or at best undesirable due to the required complete liquidation of assets prior to any disbursements must be addressed. If the guarantee must be exercised and the lender has followed prudent lending practices, then FmHA should reimburse the lender to the full extent of the guarantee. A procedure for liquidation similar to that offered under the Small Business Administration guarantee loan program should be implemented allowing for early disbursements of guaranteed proceeds based on expected liquidation values.

Congressional attention to the agricultural situation has resulted in the addition of an interest rate write-down to the FmHA's Debt Adjustment Program (DAP) and the adoption of provisions that closely follow recommendations made by the Agricultural Bankers Division of the ABA. These provisions include: reduced cash flow requirements; an extended period of time over which loans can be restructured; and improved guarantee provisions. Further, the Administration has stated that additional guaranteed funds will be provided if needed.

Other Proposed Changes

Our Association is interested in exploring possible solutions to the major problem of declining land values. A secondary market for agricultural loans should be given serious consideration as well. The ABA also encourages additional emphasis on export incentives for farm commodities versus the heavy reliance on internal supply controls.

Changes in Federal Banking Policy and Banking Services

Our Association believes that further deregulation of the banking industry would be beneficial to rural banks and the rural economy. Specifically, we support the expansion of the list of permissible bank holding company activities and Congressional authorization for geographic expansion within the spirit of states' rights. Also, we believe these proposed changes must be tied to the elimination of the nonbank-bank loophole.

Partial deregulation of the banking industry has taken place over the past five years with the phase-out of deposit interest rate ceilings. By one estimate, consumers have received more than \$34 billion in interest income that they would not have received from banks had the government maintained the ceilings. But deregulation of bank liabilities without a corresponding ability to offer new products and services limits the industry's ability to serve the economic needs of the nation. The answer must be further deregulation, both to ensure the future health of the nation's financial institutions and to satisfy increasingly vocal consumer demands for broader choices in financial service markets.

All of us as consumers have been sensitized by inflation, which has forced us to seek the maximum possible return on our deposits, and by the need to obtain in a convenient way a very wide variety of financial products and services. The problem is that outmoded laws and regulations essentially limit banks to three

lines of business — taking deposits, making loans and operating the payments system. While banks remain bound by these limitations, other organizations — Sears, Prudential, American Express and scores of others — are pioneering the financial services and service packages that consumers require. There is competition today, but it is not fair or free.

Direct mail from brokerage firms hits the Petersburg area pretty heavily. The daily paper from Springfield carries ads from such firms, as well as from Springfield thrifts. Right near my bank there are both a production credit association and a federal land bank office. Local automotive and equipment dealers offer manufacturers' financing, and as I mentioned earlier, I have local thrift and bank competitors.

Earnings lie at the heart of our industry's soundness. Earnings are used to build capital, to shore up reserves when necessary and of course to pay a fair return to shareholders, thus ensuring a continued supply of new capital when it is needed to support economic growth. The key to earnings is competition that is fair and free. The way to achieve fair competition is deregulation. Not a reduction of bank supervision and examination, but a removal of the artificial barriers to competition that today block banks from competing fully, efficiently and effectively. We believe bank holding companies should be allowed to enter new lines of business — in the field of securities: the offering of mutual funds, and underwriting and dealing in municipal revenue bonds, mortgage-backed securities, and commercial paper; in the field of insurance: underwriting and brokerage; in the field of real estate: equity investments, joint ventures, development and brokerage.

Deregulation as advocated by ABA would diversify banking not only in terms of products and services offered, but also in terms of geographic location.

Diversification would spread risk, generate new sources of earnings and over the long term strengthen the capital base. All three are necessary.

Spreading risk means operating in more than one or a few lines of business. When this happens, earnings in one area can cushion the impact of downturns in other areas, including agriculture. Spreading risk further by operating in more than one limited geographic area strengthens the equation even more — when one local economy suffers a set back, earnings derived from operations in other communities allow the business process to continue unimpeded.

New sources of earnings also help to balance the net interest margin squeeze that has been created by deposit interest rate deregulation, again strengthening safety and soundness.

The ultimate importance of earnings — over and above paying shareholders a return sufficient to assure future access to new capital — is that earnings can be applied to capital and set aside in reserve accounts, which are the first line of defense of the industry's safety and soundness.

The ABA also believes that consumers would benefit from the expansion of banking's products and services, and geographic expansion. These benefits fall into three areas. First, consumers would receive direct, tangible benefits in the form of lower prices for financial services — price reductions driven by increased competition. Second, consumers would benefit by having more and better financial services and products available to them. Third, deregulation would allow banks to put technology to work for consumers, providing a wide range and high quality of services.

But laws and regulations are blocking the road to progress.

Conclusion

The American Bankers Association supports the goal of reducing government's role in agriculture. Nevertheless, with today's fragile agricultural economy,

any rapid and major shift to market orientation, or significant decline in price and loan support levels could be disastrous, especially in the central grain producing states. Farmers, agricultural suppliers, and creditors must be given time to adjust to the current environment of deflation of assets, high real interest rates, and the over-priced dollar.

We believe our proposed changes would help, but the best way to achieve a sound farm economy over the long term is through lower real interest rates and more realistic international exchange rates. We believe the over-valued dollar which appreciated by almost 15 percent last year and high real interest rates, precipitated by runaway spending by the Federal Government, are the primary problems. Some agricultural issues will be addressed in the 1985 Farm Bill, but the most important issues remain with the overall Congressional budget, authorization and appropriation process underway. We believe that a consistently sound monetary policy combined with an effective policy for controlling the federal deficit are necessary to strengthen the agricultural sector.

Thank you for the opportunity to testify before you today. I will be pleased to answer any questions you may have.

Senator ABDNOR. Thank you, Mr. Killebrew. I must agree with you that the budget deficit has got to be attacked. As I said earlier, it disturbs me that all the attention seems to be directed toward that tax reform bill and forgetting all about the really important thing.

Mr. Gerhart, we're really pleased to have you. You're chairman of the Agricultural Rural America Committee of the Independent Bankers. You represent a large group and we're happy to have you here from Nebraska.

Your entire statement will be made a part of the record. If you care to summarize it, fine. I see it isn't very long, so you go right ahead.

STATEMENT OF BUD GERHART, PRESIDENT, FIRST NATIONAL BANK OF NEWMAN GROVE, NE

Mr. GERHART. Thank you, Mr. Chairman.

I am Bud Gerhart, president of the First National Bank of Newman Grove. It's a rural town of about 950 people. Serving a rural community of livestock and grain producers, about 80 percent of my loans are agricultural loans and the rest of them are to people who are doing business with the farmers and ranchers in the area.

I'm also chairman of the Agricultural Rural America Committee of the Independent Bankers Association of America, a national trade association with a membership of about 7,800 banks and over

5,000 of these banks are located in rural areas and communities, such as the one I come from.

Generally speaking, the banks serving rural areas are not experiencing a shortage of funds for lending. Funds are available. There is no credit crunch, as such. The problem is quality. We are also seeing a drying up of long-term agricultural credits in some areas.

However, this is due to the problems of the underlying farm economy and the deteriorating values of farmland and other farm assets, not to any shortage of credit as such.

The basic problem is that farmers are not being compensated with an adequate net return on the investments in their farming operations. The prospect of farm prices and income will remain depressed is causing a continuing softness in the value of farmland and other farm assets.

In Nebraska, the Kansas City Federal Reserve statistics show that land prices have dropped 42 percent since 1981, including a drop of 24 percent during the past year alone. Today, thousands of efficient farm producers are in trouble financially primarily because farm production costs have outstripped farm productivity gains and increases in prices received by these farmers. This includes the cost of credit, but credit is only one of several production items, including fuel, fertilizer, land costs and others, which remain disproportionately high.

Between 1972 and 1983, total farm production expenses had risen almost \$80 billion or 160 percent, of which interest expenses increased about 11 percent of that total.

Of course, these farmers who are overleveraged are facing a special burden of interest cost. But, in general, it is the overall increase in production costs, not compensated by higher farm prices, which is causing the difficulty.

At the same time, the U.S. consumer spends a lower percentage of total consumer expenditures for food than any other major country in the world. The USDA figures for 1980 says that the U.S. consumer spends 12.7 percent of their total consumer spending for food compared to 22 percent in Japan, 20 percent in Germany, and so on.

The closest level of food expenditure to the United States was Canada, with 15 percent. The American housewife has a heck of a bargain.

There has been a great deal of publicity about the fact that fewer farmers were unable to continue into the 1985 crop year that some had predicted. I think Governor Partee mentioned that.

In our area, we're seeing an expansion in Farmers Home Administration operating loans that put many farmers into the field who could not have gotten credit otherwise. The farm home direct farm operating lending now totals over \$3 billion this year.

However, present prices are not providing cash flow to service much of this additional farm home loan program. And the pain is only being delayed for an additional season. Some of these chickens will be home to roost in the fall when there just won't be enough money to pay off those loans.

Lowering commodity support prices at this time would be disastrous for many farmers and livestock producers. Until supply and demand for farm commodities are brought into a closer balance

with increased exports, production controls, or a combination, moderately higher Federal support prices are the only salvation for many productive farmers.

Many of these farmers who are in financial trouble today can survive with moderate price increases for the commodities which they produce. For instance, a 50-cent per bushel increase in corn, wheat, and soybean prices would significantly increase the survival rate. A \$1 per bushel increase would greatly slow the treadmill, which is steadily moving more farmers toward insolvency.

The financial problems that farmers are facing today are due to factors largely beyond the control of individual producers. Those causes include two decades of inflation, the Government's encouraging of farmers to plant to feed the world during the 1970's, Government tax incentives which give an unfair competitive advantage to nonfarm investors over bona fide full-time farmers, and, of course, the greatly overvalued U.S. dollar.

During the highly inflationary period of the 1970's, the farmers who bought farmland with whom I am familiar were not wild speculators who were trying to get rich, but, rather, they were hard-working people trying to make a living on the farm. Inflation forced land prices above the level of which the land could cash flow, creating debt in many cases that cannot be serviced at present commodity price levels.

Farmers were often forced at that time to buy land simply to continue farming, when an estate had to be settled or to prevent losing access to rental land vital to their farming operation.

In my judgment, it is not in this Nation's long-term interest to lose those productive farm operators who are caught in circumstances which were largely beyond their control.

Merging banks, as was suggested earlier, softer credit for Government, and all these other ideas are not going to save these good people. Price is the only answer for that one-third, and even more, in trouble.

Finally, Mr. Chairman, we need to bear in mind that the cost of providing a farm program with moderately higher commodity prices focusing on that group of medium-sized farmers who do not have off-farm income and who are totally dependent upon farming in order to make a living, may very well be less costly to the Government than allowing the situation to continue to deteriorate.

In addition to the direct impact on farm families, the cost of not providing an adequate farm program may include, first, additional Farmers Home Administration loan losses due to the further substitution of debt for inadequate income; second, decreases in earnings, employment levels, and tax payments by the retail and manufacturing agri-business companies; third, losses in earnings of other businesses and individuals located in rural communities and decreases in Government tax revenues from those sources; and fourth, a potential large role by the Government with regard to land ownership and land transfers, including substantial additional Federal costs and probably various other adverse side effects that are not clearly identifiable.

This is a pitch for higher subsidies. Nobody likes the word "subsidy." Even the agricultural bankers out in the hinterland. But I would just point out that when we talk about farm subsidies, we

should also realize that there are other subsidies that are being directed in favor of other parts of the economy, to the detriment of our farmer operators.

The cargo preference rule hurts our farmers, requiring shipments of grain abroad in American ships. We have import tariffs on tractors and other heavy equipment, trucks and so forth, which adds to the cost to the farmer who buys those trucks or that equipment. The ability of the nonfarm investor, as I mentioned earlier, to deduct farm expenses against nonfarm income is certainly a tax subsidy which creates unfair competition with bona fide farmers.

These types of subsidies I think need to be considered, too, when we're talking about farm subsidies.

This concludes my statement. I appreciate your time.

Senator ABDNOR. Thank you, Mr. Gerhart. We've been talking about the importance of getting the budget down; 4 years ago we were spending \$3, to \$4 billion a year on farm programs. Over the last 4 years, we've spent \$62 to \$63 billion. This has certainly got to be one of the fastest increases in the budget.

I'm not knocking it. I'd like to have more and more funding. After increasing the farm budget at that rate, it is hard to suddenly cut back on everything else in the budget while increasing farm funding.

It bothers me that with all the increased expenditures, agriculture hasn't improved a bit. When you look at it, it's been going backward. As you said, there's a lot of other factors, too—you mentioned cargo preference, to name one. I talk a lot about the tax sheltering, where tax laws are exploited to write off losses against outside income. Another issue is fragile lands, which are getting plowed up and should never have been touched.

We have rules on how you can build up your allotment on grain. They take the previous 2-year planning to determine what your allocation or allotment will be for your crops, making people eligible for payments on land that never should have been plowed under in the first place.

We've got a lot of people in the hog production business who were lured by the incentive of the accelerated depreciation.

I think there's a lot of problems in our farm programs that have to be dealt with. I'm afraid dollars alone won't do it. Some people argue with us in this committee that when we have a high loan rate, a CCC rate, we set the world price for grain and get edged out of the market. That's it. Everybody sells to other countries of the world—and our foreign rivals sell under our price—and we're out of competition.

We had trouble the other day deciding on how to use that \$2 billion worth of CCC grain. It was finally decided to put it into foreign sales to help get our markets back. Even that wasn't easy. We had three different meetings with the Secretary and the OMB. We brought in farm groups and some of the big grain companies. I left at recess to go home for a week and I never did hear how we finally settled that.

These problems are very complex. In light of that, we hope that you gentlemen are helping point out some of our problems.

I didn't mention that we're equally as concerned about the little main streets that are having great financial problems. We're not

just studying farming alone. We understand small town business is directly related to the farm situation. I'm concerned when I see empty buildings on main streets. When you think of small towns, my home town is the extreme.

You said your town was how big?

Mr. GERHART. About 950 people.

Senator ABDNOR. And yours is 2,500. Even in a town like that, it's tough finding finances for businesses.

So we are concerned with more than just farming, but it all relates to that.

Our next witness is Mr. Shaffer. I want to say something. I need to attend a briefing on the hostage situation and I'm going to have to slip away for a little bit.

I'm going to call on Mr. Jahr, who is my chief economist on the committee. I will turn this over to him while I leave. I'm afraid that when I go home this weekend many questions will be asked. If I haven't been well briefed on the hostage situation, I might have difficulties there.

So, Mr. Shaffer, I'm not running off on you deliberately, we're very happy that you have come all the way from Wisconsin to give us your views. Thank you and please proceed.

STATEMENT OF RON SHAFFER, PROFESSOR, DEPARTMENT OF AGRICULTURAL ECONOMICS, UNIVERSITY OF WISCONSIN, MADISON

Mr. SHAFFER. Thank you. I appreciate the opportunity to visit with the subcommittee about the issue of rural finance and its implications to nonfarm rural economies.

I'm a professor of agricultural economics at the University of Wisconsin, Madison, and I've spent the last 13 years working on issues of rural economic development through a teaching, research, and extension program. About two-thirds of my time is spent off the campus working with small rural communities in the State of Wisconsin on economic development strategies. Part of the research program has focused on the functioning of rural capital markets for nonfarm businesses. That's the topic I wish to visit with you today.

Our studies show that bank investment policies play a very important role in local economic activity. We developed an econometric model of the investment activities of the 600 Wisconsin banks and local income change between 1969 and 1974 and found that a 10-percent change in the average loan volume by those banks yielded a 4-percent increase in the rate of change in per capita income. In nonmetropolitan counties, this influence was even larger. A 10-percent increase in average loan volume over the same period yielded a 5-percent change in the rate of income growth. We found no such linkage in metropolitan counties.

Other forms of bank investment policies did not appear to have the expected negative impact on local per capita income. Our analysis of changes in net Federal fund balances, net correspondent bank balances, U.S. Government securities held found that those forms of bank investments had no influence on local per capita income change in all Wisconsin counties, nonmetropolitan Wisconsin

sin counties, or counties dominated by agricultural employment. This can be misleading, since the loans those banks made had a positive influence on local income change. Thus, nonlocal investments by banks do not appear to have an adverse impact, but there is an opportunity cost to the community in the reduced income growth from nonlocal investments rather than local lending.

We found the banks were more inclined to lend from the more stable time and savings deposits than demand deposits and that they reduced lending as the cost of funds increased. In rural areas, this suggests that ready access to national money markets may not yield the same local response as one would anticipate in the more urban areas.

Recognizing the regulatory structure has changed since the time of this study, we feel that the fundamental relationships remain.

We conducted a survey in 1979 and 1980 of new small businesses starting in the State of Wisconsin between the years of 1977 and 1978. We identified where and how they assembled their capital and the difficulties they experienced in that process.

These new small firms did not use very complex or sophisticated mechanisms to assemble the capital they used. These firms used owners funds, bank loans, and supplier credit for most of their startup and early operation capital. Limited partnerships, SBA or Farmers Home guarantees, installment purchases, et cetera, were not used.

There were few differences in the structure of the capital packages put together by the rural or urban firms studied. We defined a firm as having a rural location if it was located over 30 miles from a city of 30,000 or more, recognizing full well in States other than Wisconsin that may include a vast amount of the State. The assumption here was that places of 30,000 or more would have a fairly well developed financial institution structure and knowledge about them by businesses and their knowledge of the business itself would be reasonably complete.

We found that rural firms relied more on supplier credit and increased their use of supplier credit more than did urban firms. The terms of credit for rural firms were much more stringent. They received shorter maturities, higher interest rates and were required to provide more collateral than their urban counterparts.

The local commercial bank is crucial, but its decisionmaking capacity appears to be highly variable. One-fourth of the firms that we interviewed had had at least one credit application denied. Three-fourths of the firms initially denied credit had that same application funded by another lender. Six of the ten firms approaching another bank with the same application had it accepted.

More importantly, the firms denied credit exhibited higher rates of growth in employment, assets in net worth than did all firms in the study.

The identification of new small businesses experiencing specific forms of capital market difficulties yielded no more than 25 percent experiencing any particular form of difficulty. The measures of capital difficulty that we used were opinions about banks or all financial institutions doing a rather poor or very poor job in serving their needs. They believed that adequate expansion capital

could not be found within 30 miles of their present location, and having at least one formal loan request denied.

When firms experiencing any of these specific forms of credit stress were aggregated, 44 percent of all the firms and 48 percent of the rural firms were identified. Capital stress by small businesses in rural areas defies a single dimension measure, remembering that I said no more than 25 percent of the firms had experienced any one form.

The local commercial bank provides an important link between the local businesses and nonlocal capital sources. This is particularly important in rural areas and for medium-sized businesses. One form of this linkage is through loan guarantees, the use of secondary loan market sales, and the use of overlines. A 1981 survey of 192 smaller rural Wisconsin banks found that 47 percent of them reported using no commercial and industrial loan guarantees, 59 percent sold no loans, and 60 percent never made a loan over their legal limit.

The survey of new small businesses indicated that they were skeptical about the need to have a State agency to make or guarantee loans. Rural firms were more inclined to believe there was a need for State agencies to make or guarantee small business loans compared to their urban counterparts. Firms denied credit were also more supportive of a State agency to make or guarantee loans.

While economic theory suggests that the improvement of the loan risk evaluation capacity of smaller rural banks would improve the flow of capital to rural areas, the cost to the small bank in funds and the time may limit the success of such an effort.

Bank holding companies are one such mechanism for altering the flow of capital to rural areas and changing the financial services available. A study of the 1976 to 1980 lending activities of mature affiliated banks, those that have been affiliated at least 1 year, and newly acquired affiliated banks, found that the initial surge in lending activities of banks becoming affiliated with a banking holding company was transitory. The mature affiliated banks did not alter their loan-to-deposit ratios any more than did the nonaffiliated banks, even though both started at the same level. Our study did not examine other forms of services, such as loan evaluation capacity, higher returns on deposit, or increased access to nonlocal funds.

Commercial banks do play a critical role in rural economic development. This includes lending to small and medium-size nonfarm business and providing financial expertise to the businesses and the host community.

Our data suggests that rural capital markets appear to be functioning in a reasonable fashion. For some participants, and across the spectrum of capital market difficulties, this conclusion appears erroneous. In rural areas, new small businesses were more likely to depend on supplier credit and were more likely to face capital stress than their urban counterparts.

Capital market difficulties do not lend themselves to simple, easy solutions. Small business loan guarantees were not used by the firms interviewed and were not used by the vast majority of small rural banks that we interviewed. Small rural banks appear to be reluctant to avail themselves of existing mechanisms to move cap-

ital to rural areas. A lack of capacity to evaluate loans and risk is part of the problem. But, again, it does not lend itself to an easy solution of education and training, since management time may be the real limiting constraint.

The use of bank holding companies offers another source of capital for small rural businesses. But our analysis found little differences in their lending patterns relative to non-affiliated banks.

Thank you very much.

[The joint prepared statement of Mr. Shaffer and Mr. Staniforth follows:]

JOINT PREPARED STATEMENT OF RON SHAFFER AND SYDNEY STANFORTH²RURAL CAPITAL MARKETS: SOME EVIDENCE FROM WISCONSIN³

Although the evidence is mixed, small nonfarm businesses are an integral component of the economic vitality of rural economies [Birch; DOD; Miller; Shaffer, Salant & Saup]. There are numerous forces affecting the viability of these small businesses including general economic conditions, population change, income levels, management capabilities etc. An important force is how the capital market moves capital among uses and places. Any study of the capital market needs to be cognizant of the demand, supply and institutional components of that market. Changes in any of these components can cause undesired market outputs, and may be stimulated by different causal forces. Our purpose in this paper is to share some evidence about the functioning of capital markets in Wisconsin and how that has affected Wisconsin rural development activities.

The material reported here represents a summation of an ongoing research program in the Department of Agricultural Economics University of Wisconsin-Madison since 1975. On the remaining pages we will review empirical studies examining bank investment policies and local income changes; banks use

² Background material prepared for Joint Economic Committee of the US Congress for Hearings on Rural Capital Markets, June 19, 1985.

³ Professors of Agricultural Economics, University of Wisconsin-Madison. The research reported here was supported by Economic Development Division, ERS-USDA; Hatch and Title V Rural Development Act of 1972, University of Wisconsin-Madison; and Upper Great Lakes Regional Commission. Glen C. Pulver, Department of Agricultural Economics, University of Wisconsin-Madison, was a full contributor to the aforementioned research projects.

of existing mechanisms to bring capital into rural markets for commercial and industrial loans; lending activities of independent and affiliated banks; and examine where and how new small business starts acquire capital.

Bank Investment Policies and Local Economic Activity

Although common knowledge that bank investment policies affect local economic activity we found few studies that actually attempted to measure that relationship [Draese]. We developed a four simultaneous equation system explaining local income change, bank investment activities, changes in time and savings deposits, changes in demand deposits and other controlling factors [Ho]. This system argued that changes in local per capita income depended on changes in bank lending or other bank investment activities. Furthermore, bank investment activities were a function of local income levels, bank deposits, and related measures of economic activity. The purpose of this study was to determine the extent that changes in bank investment activities affected local income changes recognizing the interdependencies of local income, bank investments, deposits and such factors as population, national interest rates, etc.¹

The model was tested in the Wisconsin economy for the years of 1969-74. Data for the 600 banks included was acquired from the FDIC reports on income and condition for those respective years. The model assumed the bank's investments

1. This was before the recent increase in the integration of banks, and the deposit base was the major source of funds for rural banks. While the specific relationships are no doubt different today, the fundamental relationship should not have changed. An important question remaining is how sensitive are rural bank investment policies to changes in sources of funds, increased volatility of interest rates, and changes in decision making practices associated with the emerging bank structure.

effected its entire market, which because of data limitations was defined as the county. In the 71 Wisconsin counties this assumption appears reasonable.²

The different investment policies examined were loans, net correspondent balances, net federal funds sold, and US government securities. Examination of other studies and interviews with Wisconsin bank officials suggested most banks perceived the majority of their loans were made in their own market. Thus, loans were assumed to represent investments by the bank in its own local market.³ The other forms of investments represented nonlocal investments and therefore a withdrawal of capital from the local capital market.

The model was estimated with total loans from the bank and also specific types of loans (e.g., commercial and industrial, nonfarm real estate, farm operating). Also the model was estimated for metro/nonmetro counties as well as counties with their share of total employment in agriculture exceeding the statewide average.

Total loan volume had a distinct and positive influence on the rate of change in local per capita income. A 10% increase in average loan volume over the four years studied yielded a 4% increase in the rate of change in local per capita income. This relationship was even more pronounced in nonmetropolitan counties where a 10% increase in lending activity yielded a 5% increase in the rate of change in local per capita income. The average volume of loans had no impact on the change in per capita income in metropolitan counties reflecting access to alternative sources of financing. In agriculturally dominated counties (share of employment in agriculture exceeded the state average) per capita income was not influenced by the total volume of bank loans.

2. A 1975 survey of 47 banks in west central Wisconsin found 72% of the banks claiming their service area was nearby and another 15% said the county bounded their service area [Shaffer, 1978, p. 7].

3. A 1975 survey of 47 banks in west central Wisconsin found the banks placed 92% of their loans in their service area [Shaffer, 1978, p. 7].

Generally, specific loans types had no influence on the rate of change in local per capita income for all counties, but for nonmetropolitan counties and agriculturally dominated counties agriculture lending had a positive influence on the change in per capita income.

TABLE 1
Estimated Income Equations Using Aggregated Loans

| | Wisconsin Ave. | Metropol- itan Co. | Non-Metro- politan Co. | Agricul- tural Co. | Non-Agricul- tural Co. |
|--|------------------------------------|----------------------------------|--------------------------------|-----------------------------------|------------------------------------|
| Average loan volume, 1969-73 | 0.39* (1.82) | -0.28 (-1.18) | 0.53** (2.44) | 0.14 (1.52) | 0.55** (1.98) |
| Change in labor force, 1969-73 | .00054*** (4.16) | 9.5×10^{-6} (.003) | 0.00002 (0.77) | 0.00001 (1.07) | .000098*** (2.95) |
| Change in county pop. 1969-73 | -.000087*** (-5.53) | 1.4×10^{-3} (0.31) | -0.0001 (-5.54) | 0.00006 (0.36) | -0.0001 (-6.58) |
| Change in county pop., 1969-73 squared | 1.1×10^{-9} *** (5.29) | -1.9×10^{-9} (-0.25) | 0.5×10^{-9} (1.59) | -1.3×10^{-11} (-0.41) | 2.0×10^{-9} *** (4.05) |
| Change in median years of school completed by males 25 and over | 0.1 (1.01) | -0.072 (-0.27) | 0.25 (0.22) | 0.094 (1.38) | -0.03 (-0.2) |
| Constant | 0.65*** (2.64) | 1.53 (3.78) | 0.57** (2.36) | 0.91*** (1.49) | 0.59** (2.07) |
| R^2 | 0.46 | 0.53 | 0.54 | .14 | .54 |
| F | 13.10*** | 0.37 | 14.35*** | 1.82 | 11.03*** |

*, **, *** significant at 10%, 5% and 1% level respectively. Numbers in parentheses are t values.

The analysis did not detect any relationship between other bank investment activities and local per capita income changes. While, the hypothesis was a negative relationship existed, our study found no effect. Concerns about nonlocal investments by banks may be exaggerated or our statistical techniques were not strong enough to uncover the linkage. Yet, an important conclusion is that even though nonlocal investments by banks had no apparent adverse influence on local per capita income change, local loans had a definite and positive influence.

The institutional structure of the banking industry has changed dramatically since the early 70's and these results must be viewed with some caution. Latter discussion in this paper will address the current institutional environment more directly. The results still yield some insights for current discussions of capital markets and bank activities. First, there is no reason to believe that the fundamental relationship between local lending by banks and local per capita income has changed. Thus, efforts that would encourage the flow of funds to rural areas would have a beneficial effect on local per capita income. Second, the analysis demonstrated that the higher cost of funds (measured as time and savings deposit interest rates in the model) discouraged local lending. Furthermore, bank lending was more directly linked to the more stable time and savings deposits than demand deposits.⁴ These two points suggest high cost volatile funds (e.g., federal funds purchased, CD's) might actually reduce local lending even though it promotes the movement of funds among markets.

4. An unresolved distributional question is whether the community receives greater benefits from a few more commercial and industrial loans or from many savers receiving higher returns on their savings.

Small Banks Use of Complex Capital Packages

Clearly, local commercial banks have played a crucial role in economic development in rural areas of Wisconsin. Assuming that the need for this function is not disappearing or declining, many question whether rural community banks can continue to provide adequate financing for needed small business development. In general three types of rural community banks can be identified with respect to their sources of funds: (1) loan deposits only; (2) supplement deposits with sales, guarantees, etc.; and (3) borrowed funds are a significant source of loanable funds. The latter two sources of loanable funds represent complex capital packages.

Traditionally almost all banks have relied on their deposits as their primary source of loanable funds. But this may not be sufficient for small rural community banks to meet the increasing demand for loans for small business development. To meet this demand, smaller rural banks will need to gain access to capital markets beyond the deposits of their local communities.

The banking industry has long used correspondent banking to deal with one aspect of this problem. When a smaller bank wishes to make a loan which exceeds its lending limit, an overline is frequently obtained from a larger bank with which it maintains a correspondent relationship. This may be viewed as functionally selling part of a loan into a secondary market. Requirements of compensating balances, reciprocal participations, etc. can significantly reduce or virtually eliminate any net increase in local loanable funds. Such credit overlines introduce an additional step of intermediation which inevitably reduces the returns to the initiating bank. Various forms of joint participations by a group of small banks involve essentially the same limitations as overlines with correspondents. For these reasons, correspondent

banking must be considered as a specialized and limited method of accessing outside funds for local economic development.

Government agency guarantees on loans initiated by commercial lenders to selected sectors of the economy have been in use for many years. The government guarantee of a loan means that the guaranteed portion is very liquid and can be readily sold in secondary markets. Whether sold or held by the initiating lender, this process can provide access to national money markets for the initiating lender. Primary guaranteeing agencies have been S.B.A., FmHA, and E.D.A. but even at their peak of authorization and operation, the total loan volume carrying such government guarantees has been rather small compared to total needs for economic development.

There are other institutional arrangements (e.g., bonds, commercial paper) under which any bank can theoretically access national and regional money markets but high costs functionally prohibit access by small banks. This is due to the high risk and uncertainty attributed to the obligations of small unknown banks and the high cost of documenting such obligations relative to their proceeds. Access to the Federal Funds markets usually involve interest rates that are high enough to limit their use to meeting very short-run reserve needs of small banks.

A 1981 survey of all small rural banks in Wisconsin casts some perspective on the extent small rural community bank lending activity depends on the deposit base (all banks in those counties which contain no banks with more than \$100 million in assets). The 192 banks responding indicated that: about 60% of small rural banks rely almost exclusively on deposits as their source of loanable funds; another 33% had only occasionally supplemented their deposits by selling loans to other banks or investors (this group is defined as never having sold a total of more than 5 loans); and the remaining 7% of the small rural

banks had aggressively supplemented their deposits with outside sources of funds (primarily using sales and guarantees). Less than 1% relied on a significant volume of borrowed money to supplement their deposits.

The 192 respondents reported making a total of 535 complex loans--loans for which a government agency guarantee was obtained, or were sold all or in part to other institutions or individuals, or both. These include correspondent bank participations. Using this definition, complex loans constituted 22 percent of all outstanding business loan volume reported by the respondents. In general, the complex loans were small (67 percent were below \$300,000), and 78 percent were made at a fixed interest rate.

Many banks said they had little experience in making complex business loans--47 percent reported making no guaranteed loans, 59 percent sold no loans, and only 40 percent made any loans over their legal lending limit. Forty percent reported making no complex loans at all. Nonetheless, 53 percent of the complex loans--including 37 of the 39 loans greater than \$700,000--were sold all or in part to other institutions or individuals. However, most of the loans that were sold were small, averaging \$309,000 in original volume.

A large portion of the business lending activity was accounted for by a handful of banks. The twelve most-active banks were responsible for 22 percent of the total business loan volume, 47 percent of all loans sold, and 36 percent of all the complex loans. These few banks were concentrated in the northwestern, central, and southcentral portions of the state. Businesses in those areas may get sufficient access to capital from those banks. However, the most-active banks kept most of their business lending activities close to home--86 percent of their complex loans went to businesses within ten miles of their home offices. There appeared to be a general paucity of financial experience in banks in the western part of the state and in communities with

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population under 1,000. Local businesses there may find such banks less likely to meet loan demands.

Thirty percent of the respondents reported difficulties in placing overline loans. They attributed these problems mostly to pricing disagreements, paperwork and credit-worthiness. Only four banks mentioned lack of a secondary market as a problem, and only five (perhaps some of the same) banks found that a guarantee source was missing.

This lack of proven experience tapping sources of loanable funds from outside of rural communities appears to be very serious. This source of funds is crucial and important for economic development and job creation in rural communities. The problem has been further exacerbated and accentuated by the increased competition for deposits resulting from the deregulation of depository institutions. It would seem reasonable to conclude that the traditional sources of funding for small business developments in rural Wisconsin communities are not going to be adequate to meet the economic development needs in these areas.

Small Rural Banks and Lending Skills

Let us now look at the economic anatomy of a small rural bank as it relates to the financing of (small business) economic development. A typical small (rural) community bank differs greatly from the common image of a substantial corporate entity. It is not characterized by several divisions, with a large staff of management and support people in every division. It more commonly has one (or two) person(s) in management and three (or four) support persons to look after all bank activities. In such a setting management wears many hats. This frequently means one person is directly responsible for the supervision of all functions from building cleaning and maintenance, accounting and personnel

management to advertising, making loans and investments and analyzing the financial status and progress of the bank. Such a structure stresses management performance in many ways. Most importantly it virtually precludes specialization in such functions as risk evaluation of loan applications for complex developments, selling loans, and acquiring additional deposits and borrowed funds to increase loans. The initial cost of expertise in these areas are rather low compared to the resulting volume of business, and similarly high cost if contracted where such services are available. This suggests that there are some diseconomies of small size. These diseconomies are specifically associated with bringing in the nonlocal funds necessary if small rural banks are to successfully meet the needs of economic development.

One possible approach to vitalizing financial services in many rural communities is an educational program aimed at small rural bankers. Such programs could logically concentrate on using loan guarantees and sales to expand the loanable funds base. A crucial and central part of such a program would be risk evaluation and documentation procedures to make loans saleable and qualify for guarantees. The greatest limitation of this approach is the availability of managerial time in small banks is likely a limiting factor. If small bankers really wanted to perform this function and had the time, they would be doing it now.

The most likely approach permitting small rural banks to meet the financial service needs of their communities is to acquire services they cannot provide themselves. Commercial contracts for supplemental services could prove quite expensive for small banks. The option of small rural Wisconsin banks affiliating with multibank holding companies provides the opportunity to avoid serious diseconomies of size (for very small banks) without losing all community orientation.

Bank Structure and Lending Activity

Wisconsin has permitted bank holding companies since the turn of the century. The contention is banks affiliated with holding companies are more responsive (e.g., lending, services) than non-affiliated banks because the holding company provides easier access to outside funds, especially nondeposit funds, permits capturing economies of size, and allocates assets differently among cash, loans and by risk.

We examined the influence of smaller rural banks becoming affiliated with a bank holding company on selected loan to deposit ratios for a period representing rapid loan growth and a period representing slow loan growth [Rogers]. The other question examined was whether the length of time a local bank had been affiliated with a holding company affected its lending activities. A mature affiliate had been with a bank holding company for at least one year. This permitted the bank to implement changes in policy and avoid the temporary disruption associated with the transition in ownership.

The 187 banks included in the study had been chartered continuously since 1975; had 1976 total assets between \$7.5 million and \$50 million; were located in a county with no bank having more than \$100 million in assets; and were located in a county having at least one bank holding company affiliate since 1975. There were 125 non-affiliated banks, 51 banks affiliated during or prior to 1975, and 11 became affiliated between 1976 and 1978 meeting this criteria. Regression analysis was used to estimate the change in loan to deposit ratio as a function of initial loan to deposit ratio, bank size, and affiliation status.⁵

5. Comparison of average total assets, total deposits and loans to deposit ratios found no statistical differences among the 187 banks studied and all 422 smaller banks in Wisconsin.

The change in loan to deposit ratio is a more sensitive indicator of bank lending activity than comparing the loan to deposits ratio before and after affiliation.

The hypothesis was during periods of rapid loan growth the affiliated banks access to nonlocal nondeposit funds could meet increased loan demand more readily than non-affiliated banks. During the period of rapid lending growth (December 1976-December 1978)⁶ mature small bank affiliates of bank holding companies did not increase their total or sectoral loan to deposit ratios any faster than did non-affiliated banks. Mature affiliates actually reduced their commercial and industrial loan to deposit ratio relative to non-affiliated banks. During periods of slower loan growth there should be no difference in loan to deposit ratio change between affiliated and non-affiliated banks. For the slower lending growth period of December 1978 to December 1980⁷ mature affiliated banks did not alter their total or sectoral loan deposit ratios any differently than did non-affiliated banks.

While, the analysis found some evidence of an initial positive response in loan to deposit ratios with affiliation, the small rural banks that had been affiliated for at least one year (mature) did not respond any differently to changing loan demand than did the non-affiliated banks in rural areas.

Our analysis did not examine other questions regarding bank holding company performance such as new services, higher returns on deposits, improved loan evaluation capacity but the analysis did not find that affiliated banks changed their loan to deposit ratios differently in response to changing economic conditions than did non-affiliated banks.

Capital Structure of New Small Businesses

Although there have been numerous studies of small business financing most notably Interagency Task Force on Small Business Finance and Council for Northeast Economic Action none specifically examined where and how new small businesses assembled capital. In 1979-80, 134 new Wisconsin firms were questioned about where and how they assembled the capital used to start and maintain operations [Combs, Pulver, & Shaffer]. These firms started between 1977-78 and thus represented firms that actually started and were able to survive for 2-3 years at the time of the interview. The firms interviewed represented 12 different 3 digit SIC codes ranging from construction, metal working machinery manufacturing, retail grocery stores to eating and drinking places.

Firms in rural and urban locations were compared [Raizin, Shaffer & Pulver]. Firms were identified as having rural locations if their site was over 30 miles from a city of 30,000. A city of 30,000 or more was assumed to have well developed financial institutions and be close enough so the business owner would be familiar with the institution and vice versa.⁸

The survey asked firms about the sources of both equity and debt capital used for start-up and operation through December 1978. The forms of debt capital explicitly examined include formal loans from financial institutions and individuals, supplier credit, leases, installment purchases and lines of credit.

6. Between 1976-78, the banks studied exhibited a 35% increase in loans and a 23% increase in deposits.

7. Between 1978-80, the banks studied increased their loans by 9% and their deposits by 15%.

8. Sixty firms meet this criteria. While there was no statistical difference in start-up total assets among locations, there was a difference in start-up net worth.

TABLE 2

Standard Industrial Classification of the 134 Firms Interviewed

| SIC | Description of SIC | Number of Firms in Sample |
|-------|--|---------------------------|
| 15 | Construction--general contractors and operative builders | 15 |
| 354 | Metal working machinery | |
| 355 | Special industry machinery | |
| 356 | General industry machinery | 16 |
| 3599 | Miscellaneous machinery except electrical | |
| 421 | Trucking, local and long distance | 16 |
| 508 | Wholesale trade, durable goods--machinery, equipment, and supplies | 17 |
| 514 | Wholesale trade, nondurable goods--groceries and related products | 8 |
| 541 | Retail grocery stores | 16 |
| 571 | Retail furniture and home furnishings stores | 13 |
| 58 | Eating and drinking places | 20 |
| 592 | Retail liquor stores | 13 |
| TOTAL | | 134 |

The survey results indicate these firms did not use particularly complex or sophisticated capital packages. Owners' personal funds, commercial bank funds, supplier credit and loans from previous owners were the major sources of funds. Only 30% of the firms used leasing in 1978 and 60% of that was for real estate. The use of lines of credit (22% in 1978) and installment purchases (16% in 1978) was even smaller. None of the firms were limited partnerships and none had used SBA or FmHA guarantees or direct loans.

Sixty percent of the owners (i.e., sole proprietors, partners, and stockholders) in these firms just used their own funds for their equity contribution to the firm. Forty percent of the owners supplemented their own

funds with funds borrowed through personal notes, or insurance policies etc. The extent of 'borrowed' equity funds varied with type of business organization. Thirty-four percent of the sole proprietors, 40% of the partners and 52% of the stockholders of corporations assumed personal loans for some of their equity contribution. Owners of rural businesses were less inclined to borrow funds for their equity contributions than were owners of urban firms (35.0% vs. 44.6% respectively). While, the debt capital portion of these small businesses appears relatively uncomplicated, the owners showed a willingness to commit more than just funds that were 'free and clear' to the operation of the business.

Commercial banks were the most frequent source of debt capital. Between start-up and December 1978, 130 of the 134 firms had assumed at least one formal loan. Commercial banks supplied 79% of the 413 formal loans identified in the interviews. Previous owner accounted for 41% of the real estate loans.

TABLE 3

Type of Loans by Source Between Start-up and December 1978

| Source | Short Term | Medium Term | Long Term | Real Estate | Total Reported | |
|--------------------------------------|---------------|----------------|--------------|----------------|----------------|---------|
| | | | | | Number | Percent |
| Bank | 159 | 77 | 62 | 30 | 328 | 79.4 |
| Savings & Loan | 0 | 1 | 0 | 5 | 6 | 1.5 |
| Relative | 1 | 2 | 3 | 3 | 9 | 2.2 |
| Friend | 0 | 2 | 0 | 0 | 2 | .5 |
| Previous Owner | 2 | 2 | 10 | 28 | 42 | 10.2 |
| Finance Company | 0 | 4 | 1 | 0 | 5 | 1.2 |
| Insurance Co. | 1 | 0 | 0 | 0 | 1 | .2 |
| Other | 9 | 3 | 6 | 2 | 20 | 4.8 |
| Total Number of Loans Documented | 172 | 91 | 82 | 68 | 413 | |
| Percent of Total Loans Documented | 41.6% | 22.0% | 19.9% | 16.5% | | |

TABLE 4

Number of Respondents by Total Number of Recorded
Loans Reported Between Start-up and December 1978

| Type of Loan * | None | 1 | 2 | 3 | 4 | 5 | 6 |
|----------------|---------------|---------------|---------------|-------------|-------------|-------------|-------------|
| Short-Term | 67 (50.0%) | 27 (20.1%) | 15 (11.2%) | 7 (5.2%) | 5 (3.7%) | 4 (3.0%) | 9 (6.7%) |
| Medium-Term | 79 (59.0%) | 32 (23.9%) | 15 (11.2%) | 4 (3.0%) | 3 (2.2%) | 1 (0.7%) | |
| Long-Term | 74 (55.2%) | 44 (32.8%) | 10 (7.5%) | 6 (4.5%) | | | |
| Real Estate | 75 (56.0%) | 53 (39.6%) | 3 (2.2%) | 3 (2.2%) | | | |

*

Short-term -- maturity of less than one year.

Medium-term -- maturity of 1 through 3 years.

Long-term -- maturity of more than 3 years.

The interview asked about 6 short-term (maturity less than 12 months), 6 intermediate-term (13-36 months maturity), 3 long-term (maturity more than 36 months and unsecured with real estate) and 3 real estate loans. Information requested included amount, interest rate, source, maturity, purpose of loan and proportion of loan value covered by collateral. None of the firms used all four types of loans nor did more than half of the firms use any single type of term loan. Seventy percent of the firms had 3 or fewer loans, while 19% of the firms interviewed had 43% of the loans identified.

Questions on the survey about the terms of credit (e.g., amount of the loan, interest rate, collateral required, maturity in months) enabled us to examine differences in the rural/urban capital markets of Wisconsin and the

influence of borrower characteristics. A series of regression models estimated the influence firm characteristics (e.g., debt/net worth, location, size) had on the terms of credit [Peterson, Shaffer & Pulver]. Our regression analysis indicated that banks did alter the terms of credit among firms, but not in any consistent manner related to the characteristics of the firms. The extent of credit term differentiation was greater for short- and medium-term loans than for long-term or real estate loans. The general hypothesis was rural firms would receive more stringent terms of credit than urban firms. Rural firms received shorter maturities on medium- and long-term loans and paid higher interest rates on short-term loans than did urban firms.

Supplier credit was the second most frequently used source of debt capital by these firms. One hundred thirty of the firms used supplier credit and provided information on supplier credit used in 1977 and 1978. The terms of supplier credit varied among lines of business and often reflected the particular commodity financed rather than the type of firm per se. The average monthly amount of supplier credit used in 1978 increased 47% over the 1977 volume. Rural firms, while having roughly the same initial size of total assets, used substantially more supplier credit in 1977 (\$27,696 vs. \$24,628 respectively) and increased the use of supplier credit more (68.0% vs. 28.2%). This suggests that if rural firms are having difficulty with acquiring operating capital from financial institutions they have substituted supplier credit for a substantial portion of that form of capital. Despite the extensive use of supplier credit, 28.5% of the firms did not always take advantage of supplier credit discounts. Insufficient operating capital was the reason given for this failure by 73% of the firms.

TABLE 5

Average Monthly Supplier Credit^o

| | 1977 | 1978 | Percent Change |
|-----------|-----------------|-----------------|----------------|
| Rural | \$27,696 (n=58) | \$46,579 (n=59) | 68.0 |
| Urban | 24,628 (n=72) | 31,573 (n=73) | 28.2 |
| All Firms | 25,997 (n=130) | 38,217 (n=132) | 47.0 |

^o There was no significant difference at 10%.

One of the particular issues pursued in the survey was capital acquisition problems these small business start-ups experienced or perceived in their operations. They were asked for opinions about how well all financial institutions and commercial banks had met their financing needs. Most of these firms believed that all financial institutions served their needs very well or rather well (87.9%). The opinions about commercial banks serving needs very well or rather well was still a substantial majority, but lower (78.6%). At the other end of the scale, 3.8% believed that all financial institutions had served their needs very poorly or rather poorly, and 10.4% of the firms held the same

TABLE 6

Opinions About Financial Institutions and Banks Meeting Your Credit Needs

| | Very Well | | Well | | Fair | | Poor | | Very Poor | |
|-----------------------------|-----------|------|--------|------|--------|------|--------|-----|-----------|-----|
| | Number | % | Number | % | Number | % | Number | % | Number | % |
| ALL FINANCIAL INSTITUTIONS | | | | | | | | | | |
| Rural (n=60) | 34 | 56.7 | 17 | 28.3 | 8 | 13.3 | -- | -- | 1 | 1.7 |
| Urban (n=73) | 44 | 60.3 | 22 | 30.1 | 3 | 4.1 | -- | -- | 4 | 5.5 |
| TOTAL ⁺ (n=133) | 78 | 58.6 | 39 | 29.3 | 11 | 8.3 | -- | -- | 5 | 3.8 |
| BANKS | | | | | | | | | | |
| Rural (n=58) | 34 | 58.6 | 9 | 15.5 | 8 | 13.8 | 5 | 8.6 | 2 | 3.4 |
| Urban (n=68) | 45 | 66.2 | 11 | 16.2 | 6 | 8.8 | 1 | 1.4 | 5 | 7.4 |
| TOTAL ⁺⁺ (n=126) | 79 | 62.7 | 20 | 15.9 | 14 | 11.1 | 6 | 4.8 | 7 | 5.6 |

⁺

⁺⁺ One firm did not respond.
8 firms did not respond.

opinion about commercial banks. Relatively fewer of the rural firms believed that all financial institutions and commercial banks were meeting their needs very well or rather well.

More than one in five (22.4%) of the firms did not believe they could find adequate expansion capital within 30 miles of their operation. Rural firms were more likely to believe they could not find expansion capital within a 30 mile radius than urban firms (25% vs. 20.3%). This is particularly significant since these firms collectively increased their total assets by 92%, their net worth by 108% and total employment by 49% between start-up and December 1978.

Twenty-four percent of the firms (24%) had at least one credit application turned down by a formal lending agency. Three-fourths of these firms, however,

TABLE 7
Credit Denial Experience

| | # of Responsee | % of Total 33 |
|--|-------------------|------------------|
| Q: What did you need the financing for? | | |
| R: Operating capital | 21 | 63.6 |
| Equipment/fixtures | 6 | 18.2 |
| To purchase the business | 3 | 9.1 |
| Building (purchase/renovation/construction) | 3 | 9.1 |
| TOTAL | 33 | 100.0 |
| Q: What type of credit source did you go to? | | |
| R: Bank | 21 | 63.6 |
| Governmental agency | 5 | 15.2 |
| Other | 7 | 21.2 |
| TOTAL | 33 | 100.0 |

TABLE 8

Alternative Financing Routes After Credit
Application Was Originally Rejected

| Number Responding | |
|----------------------|--|
| 16-- | Took their original application to a second prospective source and were successful. |
| 7-- | Took their original application to a second prospective source; were refused again, but were still able to get financing from some source. |
| 1-- | Adjusted the original application and was then accepted by the original source. |
| 1-- | Adjusted to the original application and had that new application accepted by the second source approached. |
| 4-- | Tried at least two different sources but never were successful. |
| 4-- | Abandoned their attempt to get financing after the first refusal. |

TABLE 9

Reasons for Credit Denial

| | Rural | | Urban | | All Firms | |
|--|--------|-------|--------|-------|-----------|-------|
| | Number | % | Number | % | Number | % |
| Did not accept proposed use of the funds | 4 | 26.6 | 7 | 38.5 | 11 | 33.3 |
| Lack of equity in business | 2 | 13.3 | 5 | 27.7 | 7 | 21.2 |
| Wanted more collateral | 3 | 20.0 | 2 | 11.1 | 5 | 15.1 |
| Applicant was considered unacceptable credit risk personally | 3 | 20.0 | 1 | 5.5 | 4 | 12.1 |
| Required higher cash down payment | 0 | 0.0 | 1 | 5.5 | 1 | 3.0 |
| Had not fulfilled requirement to quality for loan | 1 | 6.6 | 0 | 0.0 | 1 | 3.0 |
| Income too high for government loan | 1 | 6.6 | 0 | 0.0 | 1 | 3.0 |
| No reason given | 1 | 6.6 | 2 | 11.1 | 3 | 9.1 |
| TOTAL | 15 | 100.0 | 18 | 100.0 | 33 | 100.0 |

were able to get that request financed after approaching another lender.⁹

Operating capital requests were the most frequent type of loan applications turned down (63.6%). Lenders offered substantial input into the decisions by

9. Six of the ten firms approaching another bank with an application previously rejected had that application approved.

the firms. The reasons for denying the loan request were 33.3% did not accept the proposed use of the funds, 21.2% did not believe that firms had sufficient equity and 15.1% required more collateral. Rural banks were more likely to deny an application because of inadequate collateral, and were less likely to deny an application because of the proposed use of the funds or lack of equity than were urban banks.

The data in Tables 8 and 10 indicate the difficulty judging credit applications and how variable the criteria are for acceptable applications or

TABLE 10
Growth Rates of Firms Denied Credit And All Firms

| | Start-Up | December 1978 | Percent Change |
|---|-----------|---------------|----------------|
| AVERAGE TOTAL ASSETS⁺ | | | |
| Rural All Firms (n=60) | \$ 85,892 | \$160,747 | 87.2 |
| Rural Denied Credit (n=15) | 65,507 | 228,720 | 249.2 |
| Urban All Firms (n=74) | 89,321 | 174,473 | 95.3 |
| Urban Denied Credit (n=18) | 105,905 | 194,560 | 83.7 |
| All Firms (n=134) | 87,785 | 168,384 | 91.8 |
| Firms Denied Credit (n=33) | 86,784 | 210,087 | 142.1 |
| AVERAGE NET WORTH | | | |
| Rural All Firms (n=60) | 34,244* | 61,624 | 80.0 |
| Rural Firms Denied Credit (n=15) | 16,873* | 51,647 | 206.0 |
| Urban All Firms (n=74) | 19,333 | 48,836 | 152.6 |
| Urban Firms Denied Credit (n=18) | 19,444 | 53,403 | 174.6 |
| All Firms (n=134) | 26,010 | 54,138 | 108.2 |
| Firms Denied Credit (n=33) | 18,276 | 52,605 | 187.8 |
| AVERAGE TOTAL EMPLOYMENT | | | |
| Rural All Firms (n=60) | 3.55 | 7.50 | 111.0 |
| Rural Firms Denied Credit (n=15) | 4.13* | 14.67 | 255.2 |
| Urban All Firms (n=74) | 5.97* | 8.73 | 46.2 |
| Urban Firms Denied Credit (n=18) | 4.89* | 10.50 | 114.7 |
| All Firms (n=134) | 4.89 | 8.18 | 67.3 |
| Firms Denied Credit (n=33) | 4.54 | 12.40 | 173.1 |

* Significantly different at 10%.

how variable the skills are in making the judgement. For the firms denied credit, total assets, net worth, and total employment grew at a faster rate than for all firms in the sample. This phenomena occurred in both rural and urban regions with the exception of total assets for urban firms.

The preceding evidence suggests the capital market difficulties of new small businesses while existing are not pervasive. Capital stress for small firms however, occurs in numerous ways and does not lend itself to a single dimension measure. The firms either expressing an opinion of very poor or rather poor support of their needs by commercial banks or all financial institutions or believing they could not acquire expansion capital in a 30 mile radius or having a loan request denied amounted to 44% of the firms in the sample. The capital stress index indicates relatively more of the rural firms (48.3%) than urban firms (40.5%) did not believe capital markets were functioning well from their perspective.

Even with the relatively high share of firms experiencing some capital stress, their opinions were almost equally divided about the need for a state agency to either guarantee or make direct loans. While, 43.3% expressed some interest in a state agency to make loans to small businesses, 30.6% said there was no need. The desire for a state loan guarantee was even less vigorous. Fewer firms wanted a state loan guarantee program (31.3%) than believed such a program was needed (35.8%). Rural firms were much more interested in a state agency to make loans (54.5% favored) than urban firms (33.8% favored). More urban firms actually indicated no need for a state agency to make loans (35.1%) than were in favor of such an agency. While more rural firms favored state guarantees of loans (35.0% favored) than believed there was no need (30.0%) the interest in such a program was much less enthusiastic. Again more urban firms believed there was no need for state guarantees (40.5%) than favored such a

program (28.4%). The belief in the need for a state agency to either make or guarantee small business loans increased dramatically if the firm had experienced a credit denial. Rural firms were much more interested in state agency support than were urban firms after a credit denial. One interpretation of these results is a willingness to work with a public agency rather than the local bank regarding small business finance. Yet, a substantial proportion of these firms (21.2%) had an adverse reaction to current SBA and FmHA programs even though none had used these programs.

TABLE 11

Need For a State Agency

| | Strong Need | | Some Need | | No Need | |
|---|-------------|------|-----------|------|---------|------|
| | Number | % | Number | % | Number | % |
| NEED FOR STATE AGENCY TO MAKE LOANS BY REGION | | | | | | |
| Rural | 33 | 55.0 | 12 | 20.0 | 15 | 25.0 |
| Urban | 25 | 33.8 | 23 | 31.1 | 26 | 35.1 |
| TOTAL | 58 | 43.3 | 35 | 26.1 | 41 | 30.6 |
| NEED FOR STATE AGENCY TO GUARANTEE LOANS BY REGION | | | | | | |
| Rural | 21 | 35.0 | 21 | 35.0 | 18 | 30.0 |
| Urban | 21 | 28.4 | 23 | 31.1 | 30 | 40.5 |
| TOTAL | 42 | 31.3 | 44 | 32.8 | 48 | 35.8 |
| NEED FOR A STATE AGENCY TO MAKE LOANS BY REGION BY FIRMS DENIED CREDIT | | | | | | |
| Rural | 11 | 73.3 | 2 | 13.3 | 2 | 13.3 |
| Urban | 7 | 38.9 | 4 | 22.2 | 7 | 38.9 |
| TOTAL | 18 | 54.5 | 6 | 18.2 | 9 | 27.3 |
| NEED FOR A STATE AGENCY TO GUARANTEE LOANS BY REGION BY FIRMS DENIED CREDIT | | | | | | |
| Rural | 9 | 60.0 | 4 | 26.7 | 2 | 13.3 |
| Urban | 7 | 38.9 | 4 | 22.2 | 7 | 38.9 |
| TOTAL | 16 | 48.5 | 8 | 24.2 | 9 | 27.3 |

CONCLUSIONS

One interpretation of the evidence presented in this paper suggests rural capital markets are functioning relatively well for many new small businesses. Only a nominal proportion of the new small firms experienced any specific form of capital market difficulty (e.g. adverse opinion about financial institutions services, had been denied credit or were unable to find capital locally). Yet, when a broader perspective of capital market failure is used 44% of all the firms and 48.3% of rural firms were categorized as experiencing some capital stress. Capital market difficulties take many different forms and no single firm is necessarily affected by all forms. Nor does a single measure capture all the different aspects of capital stress.

Generally, these new small businesses were not particularly interested in state agencies to make or guarantee small business loans. This interest increased with rural locations and having a loan request denied. Other evidence indicates that small rural banks were not active users of loan guarantee or sellers of portions of commercial and industrial loans into the secondary market. Attempts to use secondary loan market to 'solve' rural capital market failures for newer-smaller businesses through existing banks, especially smaller banks, may not yield substantial improvement in the movement of capital.

These new small businesses did not use complex capital packages to start and support their operations. Banks were the most common source of loans and supplier credit was an important source of operating capital. Long-term debt was difficult to acquire. Attempts to provide capital to newer-smaller businesses may be facilitated through the use of financing suppliers rather than the small businesses themselves.

While the analysis of the effects of bank investment policies on local income suggests nonlocal investments did not have a negative effect on local income change, local lending did have a positive effect. This linkage was stronger in nonmetropolitan counties. The significant role local banks play in local economic development can not be denied, and the information shared here indicates there could be a substantial local opportunity cost in excessive non-local investments by the local bank.

The variability in capacity to judge loan applications was highlighted by the high success rate of firms re-applying to another lender, plus the faster growth rates of firms denied credit compared to the growth rate of all firms. This capacity to evaluate loan risk is crucial regardless of whether the bank funds the loan with local or non-local funds.

The analysis of change in loan to deposit ratios implies the surge in lending as banks become affiliated with holding companies is transitory. Arguments that smaller banks becoming affiliated with holding companies will improve local capital markets was neither confirmed or denied. Lending activity of mature affiliated banks does not appear to differ from non-affiliated banks. Other proposed changes such as additional services or better risk evaluation were beyond your data.

The increased size and complexity of economic development activities in rural areas may preclude smaller local banks from being active participants. If this is true, then efforts to finance rural economic development may need to rely on alternative forms of financing.

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Mr. JAHR [presiding]. Thank you, Mr. Shaffer.

For the record, my name is Dale Jahr. I am senior economist for the Joint Economic Committee and coordinator of the Senator's rural economic agenda.

Senator Abdnor asked me to convey his deep regrets for having to leave before the end of the hearing this morning. As you may know, the Senate went into closed-door executive session sometime ago to discuss the situation in Beirut.

Our final panelist this morning is Mr. David Meadows, who is Associate Director of the Division of Bank Supervision at the FDIC.

Mr. Meadows.

STATEMENT OF A. DAVID MEADOWS, ASSOCIATE DIRECTOR, DIVISION OF BANK SUPERVISION, FEDERAL DEPOSIT INSURANCE CORPORATION

Mr. MEADOWS. My name is A. David Meadows. I am the Associate Director of the Division of Bank Supervision at the Federal Deposit Insurance Corporation. My responsibilities primarily are in the area of overall bank supervision. I oversee the supervision and enforcement activities involving problem banks. I also oversee the FDIC's involvement in failing banks and assistance transactions.

We welcome the opportunity to present the FDIC's views on issues related to the current farm situation and the impact of that situation on the banking industry and the implications for bank supervision and regulation. My remarks will focus primarily on the affect of farm problems on banks and the FDIC.

The problems with agricultural banks began in 1981 and 1982 and became increasingly noticeable in the banks in mid-1984. During 1985, the number of problem banks and agricultural bank failures have grown and it appears that problems with agricultural banks will continue to grow until the conditions in the agricultural economy show improvement.

I might add that of the 47 bank failures we've had so far this year, 27 were considered to be agricultural banks, roughly 57 percent of the failures.

Despite the dramatic increase in problem banks and bank failures, the situation is manageable, although there could be disruption in the communities where bank failures occur.

Also, despite the record failures, the FDIC fund continues to be strong and continues to grow with assets over \$18 billion.

There have been many suggestions for ways to deal with the situation. The FDIC, along with other bank regulators, have spent countless hours meeting with various groups for the purpose of learning, as well as exploring ways to improve the farm situation.

While many of the suggestions have merit, some do not seem to get to the root cause and, at best, may only provide stop-gap relief.

I think it is clear from the discussions in which I have participated that the farm situation will not show noticeable improvement until there is reinvigoration of the agricultural economy. Furthermore, this improvement seems dependent upon, as other speakers have mentioned, getting the Federal budget deficit under control, lower real interest rates, and, to some extent, improved foreign markets for American farm products.

I might add that availability of credit does not appear to be a problem; rather, a major problem with the banks seems to be the lack of creditworthy borrowers.

It is doubtful that a painless solution can be found. No doubt many farmers will find it necessary to exit from the farm business, possibly at considerable financial sacrifice. In addition, there likely will be additional bank failures in farm communities.

The FDIC is acutely aware of and sympathetic to the agricultural crisis. However, there is little we can by ourselves do to alleviate the agricultural credit problem. We will continue to participate in initiatives to aid in the recovery of the agricultural sector when such initiatives are consistent with considerations of safety and soundness and maintaining confidence in the banking system. I'd be glad to answer any questions.

Mr. JAHR. Thank you very much, Mr. Meadows. Our panel represents a very broad spectrum of the financial services industry and also the analysis of it.

If the panel will allow me, I would like to ask some questions on behalf of Senator Abdnor.

Very few industries have gone through the kind of regulatory change in the regulatory structure imposed on them as has the banking industry. We have 50-year-old regulations and guidelines that just haven't been working as well in recent years as they should to protect consumers, the industry, and the national interest.

I would like to read a list of banking terms which have been cited in public policy forums in recent years and I would like you gentlemen to respond briefly, if you would, as to how rural America and its financial institutions have been affected by these terms.

To start with, let's discuss interest rate deregulation on deposits. Would any of you care to comment on that?

Mr. Killebrew.

Mr. KILLEBREW. Well, I guess it's both good news and bad news. For those customers who are savers at our institution, interest rate deregulation has been a long-awaited boon. They have prospered by it and they believe that it's something that's been very positive.

For the borrowers at those same institutions, interest rate deregulation has caused problems. It's increased their cost of funds which they were borrowing from the bank and has contributed in rural communities to some of the problems that are being experienced by the farmers and the agri-business people.

But I think in the overall, it has been positive, because all of us have mentioned that availability of funds has not been a problem at this particular time. If we go back to 1969 and 1970 and again in 1974 and 1975, when we saw periods of higher interest rates, there were problems of availability of funds because the funds were not available in the local institutions. They were going to other places where there was a higher return.

With interest rate deregulation, we have got away from having credit crunches, so to speak. There are many citizens who live in our communities that are depositors who have benefited greatly by them.

Mr. JAHR. Would you or any of the other witnesses recommend or advocate a return to regulation Q?

Mr. KILLEBREW. I would not advocate that.

Mr. MEADOWS. We certainly would not.

Mr. GERHART. Well, I think the interest costs since deregulation in the area that I serve have gone up 4 or 5 or 6 percent, I suppose. It's been very hard on our borrowers, as was pointed out here.

It would be pretty hard, however, to go back to regulating interest rates that banks can pay their depositors without also putting controls on mutual funds and other competitive type instruments.

And that's really what's raised Cain with us, of course.

Mr. JAHR. The next term is monetary policy. Perhaps any of you may want to discuss how changes in monetary policy in recent years have had an impact on rural banking institutions.

Mr. KILLEBREW. In my prepared statement, I pointed out that the change in monetary policy with the Federal Reserve had been one of the things that had contributed to higher interest rates. But I think that the other side of that is the effect it has had on inflation. It has brought inflation under control, or down to an acceptable level. There was a time when we looked at 4-percent inflation as being high. But it is certainly much more favorable than 12 and 15 percent. But the cost of that has fallen heavily on the shoulders of those farmers who were in a high leverage position. And those are the people, I think, that make up the 30 percent of the farm customers who are in trouble that Mr. Partee related to earlier this morning and those are the borrowers that are causing all of us at this table the biggest portion of our problems.

Mr. GERHART. Well, being one of the five leading economists in Newman Grove, NE doesn't really qualify me to second-guess the Fed—

[Laughter.]

Mr. GERHART [continuing]. Except to say that until we get a fiscal policy in this country to get the deficit under control and everything, why, I really can't find fault with the Fed for trying to maintain a monetary policy that will hold down inflation.

Mr. JAHR. I know if Senator Abdnor were here, he would agree with you strongly.

Would any of you like to comment on interstate banking?

Mr. GERHART. Well, I will. [Laughter.]

And then I'll shut up.

I don't see where different types of banking structure or this interstate banking or anything else is going to help anything that we've been talking about this morning. These farmers need prices. And moving to different types of banking organizations, or whatever, soft Government credit, as I mentioned, is not going to solve any problems. In fact, it could accelerate the flow of funds out of the rural communities if these larger banks can find better uses for their funds than putting them into some of these very high risk farm operational loans right now.

Mr. SHAFFER. Parts of my testimony and prepared statement address the holding company portion of that question. Our research suggests that the initial surge of lending activities tends to be a transitory phenomenon, at least in rural Wisconsin communities. So I would tend to agree with Mr. Gerhart's general conclusion that it probably would not be a great boon for rural areas.

Mr. KILLEBREW. I guess I would agree with Mr. Gerhart that it's probably not going to have a great effect on the supply demand for agricultural commodities or commodity prices. I do think it could have some positive results as far as the availability of capital for banking institutions in the rural communities. I think it has some positive benefits from the standpoint of being able to diversify geographically. And some of the banks that are located in primarily rural areas, if they could in some way become affiliated with a bank in a metropolitan area and provide a larger geographic base and also help spread out some of the burden, and Mr. Partee, I believe, alluded to that in his testimony this morning, the fact of spreading the burden of some of the agricultural problems over a wider area.

Mr. MEADOWS. You know, it's difficult to talk about interstate banking as it relates to some of these rural areas. Some of the States don't even allow banks to branch in the next town or even within the same county. We have encouraged, through our testimony, that these States take a look at various laws which restrict branching to see if they really serve the needs in the present day economy.

Mr. JAHR. Next, how are rural communities affected by bank mergers and a greater concentration of financial resources within the industry?

Mr. SHAFFER. We're just starting a study looking at that specific question. There are some people in the western part of the United States looking at that question. Some of the early and tentative evidence suggests an improvement in the quality of services available in form of returns on deposits, in capacity to make judgments on loan applications a typical small town banker may only see once every 2 or 3 years, and through increased access to some nonlocal funds.

In contrast, there also appears to be a loss of management committed or tied to that local area. What sometimes appears is bank managers who are on the proverbial corporate ladder and this rural community bank is just one stop on that ladder. To the extent that that doesn't occur, it seems to be a fairly positive influence.

Mr. JAHR. How has rural America been affected by the emergence of nonbank banks?

Mr. Meadows.

Mr. MEADOWS. I don't know that we've really seen any affect on rural America. There are a number of nonbank banks nationwide, but I think very few of them are in small rural communities.

In fact, I don't know of any that are in small rural communities.

Mr. JAHR. If they aren't there, perhaps there are savers or investors in rural communities which, instead of investing their funds in the local community bank, are instead attracted to these nonbank banks.

Is that occurring?

Mr. MEADOWS. Well, that may occur. But it's pretty much a national market, anyway, I think, because someone mentioned the fact that the ads in the local paper were from financial intermediaries located many miles away. And whether you have a non-

bank bank or not, there's going to be someone else other than the bank competing for those savings dollars.

Mr. GERHART. I might comment on the nonbank thing. I have two classes of customers in a country bank in Nebraska. The one class are the depositors, who are generally the older residents of the community, sometimes retired residents who have farmed and sold their farms and they've converted to cash and they have the deposits.

The borrowers are the other group I have that are borrowing this money and they're operating farmers and ranchers and livestock people.

The advent of the nonbank bank I don't think we've felt yet, but we will. And I think the way we'll feel it will be that we'll have a much stiffer demand competition for deposit dollars. I don't think the nonbank banks are going to be interested in servicing these agricultural borrowers that we're trying to keep alive now. But they will be going after the deposit dollars in the rural communities and make it just that much more difficult to service agriculture.

Mr. JAHR. Out of curiosity, is the typical rural resident a net saver or a net borrower?

Mr. KILLEBREW. I would agree as far as the makeup of the customers being net borrowers or net savers. It has a great deal to do with age. Those people reach about 50 years of age and they have their homes, making their last mortgage payments and their children are beginning to get out of college. They become net savers rather than net borrowers.

That's also true with many of our small business and farm customers, although in recent years the farm customers, we've had more net borrowers than we've had net savers, and that's been one of the problems.

As far as the effect of the nonbank bank, we see it in our little community in terms of brokerage houses, in terms of the local Prudential Bache insurance agent who runs ads in the paper and sells FSLIC-insured deposits in the community. Yet, he has absolutely no—he's not required for CRA-type of activities such as we are to show that we are meeting the needs, the credit needs of our community.

I really have no objection to these people marketing these types of instruments in the community as long as they have the same responsibility that I have in the community and the same responsibility of meeting credit needs, meeting certain credit standards, meeting certain disclosure requirements that we are required by the FDIC and others to meet.

I think these competitors, if they're going to operate in our market, need to be subject to the same level of regulation and the same level of disclosure and the same level of accounting standards so that the public can make an honest decision as to which is the safest and the soundest place for them to place their dollars.

Mr. JAHR. In your estimation, could these alternative places for depositors to place their funds jeopardize the local economy; that is, could these towns run out of funds available for local economic development?

Mr. KILLEBREW. If I understood Mr. Shaffer's testimony when he was giving it, he alluded to something about, that as the cost of

funds rose, the level of lending activity or the willingness of the lenders to lend in the community declines.

Well, I don't think it's the willingness of the lenders to lend. I think it's the ability of the borrowers to pay that really reduces that activity.

And in a national market, during times of high interest rates and as we go through these times of extreme high interest rates, the institutions who are in those local economies have to raise the rates to their savers in order to keep that money in the community and have it available to meet loan demands.

But as interest rates rise, you very quickly begin to lose a large segment of your borrowing customers. They just can't afford to pay the rates. The businesses in those communities for a long period of time have been based on being able to borrow money at 8- or 9-percent interest. The businesses will make 10-, 12-percent return on their assets.

But when you have to pay 15 percent for the money and you're still making 10 to 12 percent on the assets, it just doesn't work.

Mr. SHAFFER. Mr. Killebrew is quite correct in capturing the nuance of what I said. But one of the things that we found in looking at existing banks and their willingness to use external and non-deposit funds was that many of those smaller banks, assets of \$100 million or less, were not using existing mechanisms to bring capital into those rural communities.

Now if that pattern continues and if the deposit base is drawn out of rural communities, then those banks will find themselves increasingly pressed to service the needs of more highly capitalized farming operations or even some of the medium-sized nonfarm businesses starting to appear in rural Wisconsin.

Mr. JAHR. As all of you know, market forces coming to bear on the financial services industry are blurring the distinction between banks, thrift institutions, securities business, and even insurance.

How is that going to affect rural communities?

Mr. Killebrew, in your testimony, you alluded to the fact that the ABA is very interested in expanding the types of services it can offer its consumers.

Mr. KILLEBREW. I think there are quite a few things going on in the economy as a whole and also in the rural economy as far as how agriculture is being financed. And I think that's one of the real big questions that we have here today—who's going to finance agriculture 10, 15 years from now? What role is the farm credit system going to play? What role is the local commercial bank, whether it be an independent bank or a member of a large holding company, or a branch of a larger bank, going to play in financing agriculture?

I think an interesting development that we have seen in our area, there's a company in Moline, IL called John Deere. John Deere has traditionally been the maker and manufacturer of farm equipment.

About 5 years ago, they purchased an insurance company. They about 2 years ago purchased a credit card company. They have now started opening up branches of John Deere Insurance Co. in communities and offering a full line of both casualty and life insurance products.

Is it out of line to think that maybe at sometime—at this point their credit card company is only used by their dealers and it's in its infancy. But I can see them following along the same lines that Sears is certainly attempting to go with a Discover card and with their security arm and with their Coldwell Banker and real estate.

And I think that we're going to see major attempts for financial supermarkets, so to speak, and one-stop type of financial services. The farm credit service certainly looked into that in some areas. They offer some insurance products, some recordkeeping products at this point, in addition to credit functions.

I think that you're going to see the banking industry needs to be able to participate in those activities and broaden that product line. We're not all going to be in real estate brokerage. We're not all going to be taking equity participations. We're not all going to be in insurance.

But I think that as niches in our marketplace appear, we should be able to take advantage of that and compete with others who have those advantages today.

Mr. GERHART. Well, I'll just comment that the smaller banks in Nebraska, anyway, and I think this is true in the Midwest, already have insurance powers and they already have real estate brokers, usually, or often within the banks. So those services have been, and are, available now.

The securities powers don't really amount to too much for the small banks, although they probably amount to some profit centers for the larger banks and I have no objection to that. But the real thing that's going to make or break the area that I serve out there is not more services and that type of thing so much as profitability or prices coming back to our borrowers, who are really the foundation of our rural communities.

So the other things are all secondary to getting a price and a profitability situation out in the rural areas.

Mr. KILLEBREW. The insurance and real estate really varies from State to State, and what you can do in Iowa and Nebraska is quite different from what we can do in Illinois and some other States.

Mr. JAHR. Would you prefer being regulated at the State level as it is now or the Federal level?

Mr. KILLEBREW. I'm a great believer in States rights, but I do believe that we ought to have the level of permissible activities for the holding companies to include these areas so that they can become permissible activities under the bank holding company.

At this time, it's limited to banks and communities of under 5,000 or under \$50 million in assets, and that's fairly restrictive. We talk about banks under \$100 million here today and that leaves a lot of banks out of that particular guideline.

Mr. JAHR. George, we're not meaning to leave you out of this discussion at all. [Laughter.]

As a matter of fact, you probably can guess, we have many questions having to do with the farm credit system. After hearing rumors about problems in the Federal Land Bank in Omaha, Spokane, and even recent rumors of trouble in Minneapolis.

I know that Senator Abdnor would relay to you an incident that occurred last February in a regional field hearing of the Joint Economic Committee in Freeman, SD. We had several ranchers and

farmers from northern Nebraska and southern South Dakota come in and present some very convincing testimony about a Federal land bank in the Cody, NE area closing its doors without consideration for the fact that a community bank just 10 miles away had been forced closed, leaving dozens of farmers and ranchers without any type of local financing options available to them. He was concerned that the farm credit system didn't take into consideration what's going on with commercial lending institutions when it made a decision independent of them to close their doors.

Mr. IRWIN. I presume you'd like a little bit of reaction, anyway. I was not involved in that particular hearing, but I suspect that I can talk about circumstances a little bit.

A production credit association or a Federal land bank association is no different than a commercial banker when it comes to evaluating its financial viability. The farm credit system does have a little bit more of the powers like a bank holding company would have in the ability to provide assistance to a local institution once it gets into trouble, or at least there is the option of doing so.

But the same kinds of conditions that caused those commercial bankers to be in deep difficulty were the conditions that also caused the loan portfolio and the farm credit system to be in exactly the same hot water. So you would kind of expect that you would have the confluence of these problems in that area.

But I think in most cases the FDIC would be involved with the banker, and I think their policy would be just like ours, that there is a takeover institution in almost all cases, and those customers may for a short time perceive that they don't have services. But every effort is made to assure that those customers that do have any kind of potential are spun off into another financial organization that can serve them equally well.

The problem is that you always have a bunch of marginal accounts in those institutions, in addition to the ones that actually cause the institution to fail. And what happens to those folks becomes the real concern issue.

But, again, I think both the deposit insurance and the farm credit system have mechanisms where someone handling the liquidation can provide interim financing to these crippled situations where there isn't any other place for them to go.

Of course, at that point, the objective does become clearly orderly liquidation. There really isn't any more forbearance beyond what makes good sense to protect the assets.

Mr. JAHR. Is there any formal communication that takes place between the FDIC and the farm credit system in situations like this? And would it be advisable?

Mr. MEADOWS. I'm not aware that there is any communication, at least at the Washington level. Whether there is at the local level or not, I'm not sure.

But I think I should point out that the FDIC's role generally is to try to find a buyer for a failed bank. A new bank would then be in the community to make loans to creditworthy customers. Unfortunately, as George, I think, indicated, there are a number of marginal customers who probably would not qualify for credit from the new institution.

The other thing that has occurred is that we frequently find there is absolutely no interest in some of these small communities. In other words, we have had a few cases recently where we advertised or tried to put a bank up for bid and no one wanted it. In these situations, our only choice, then, is to pay off the insured depositors.

Mr. JAHR. Do you expect that to become a trend, by the way?

Mr. MEADOWS. Do I expect it to become a trend? No; I don't think so. But the fact is that there are a number of banks located in one-bank communities where the community is literally drying up. Bankers are businessmen and I think a number of them, or most of them, would be much more interested in a thriving community than one that appears to be dying.

Mr. JAHR. Anyone else care to comment on that?

[No response.]

Mr. JAHR. George, I have another question for you. Is it true that the farm credit system is shuffling bad debts among its regional centers in an effort to elude looming insolvency problems at individual Federal land banks?

Mr. IRWIN. Well, the specific answer to your question is "No." But beyond that, the problem we have currently is not with the Federal land banks. It's with the Federal intermediate credit banks and the PCA's, because it's basically the short-term credit repayment problem that has caused most of the losses in the last couple of years.

The problem of trying to mobilize a dispersed capital base to solve these problems is the one that they are dealing with, and they are not shuffling things around to try to hide them from anybody in particular, but to be able to deal with them.

Mr. JAHR. Mr. Meadows, occasionally when I'm out in the field on committee business, I will hear complaints among community bankers that they have to pay the same rate for deposit insurance as do large money centers.

Would you care to comment on the rate structure for deposit insurance?

Mr. MEADOWS. Well, it is true that all banks pay basically the same rate. The FDIC has proposed legislation which would allow us to charge premiums based on the degree of risk in the individual institutions. And we are hopeful that that legislation will be passed, which would enable us to more fairly charge premiums based on the risk to the Federal deposit insurance fund.

We're also proposing that we should be allowed to charge problem banks for the cost of the extra supervision which is required.

Mr. JAHR. What is the position of the ABA with regard to deposit insurance?

Mr. KILLEBREW. Well, I believe the ABA supports the risk-related premium, which has been proposed by the FDIC. It views this as a positive step and as a part of deposit insurance reform, and only a very small part of what needs to be done in overall deposit insurance reform.

Mr. JAHR. Is that true for the IBA, too?

Mr. GEFHART. The IBA certainly is in favor of the FDIC's recommendations to that effect. We also feel that the foreign deposits,

which some of the larger banks enjoy without, as I understand, paying a premium on, isn't fair to the small banks.

I'm paying a deposit insurance premium on all of my deposits in Newman Grove, NE. I feel that that should be true of everyone.

Mr. JAHR. In recent weeks, we've seen problems with runs on deposits in the States of Ohio and Maryland. Do you anticipate any other States are going to be having problems in the near future?

Mr. MEADOWS. Well, I assume that that question was directed to the FDIC.

Those particular runs were in privately insured institutions. There aren't many States which permit this particular kind of institution.

I think steps are already underway in a number of States to require Federal deposit insurance for the privately insured institutions. And we're hopeful that there will not be a recurrence of the chaos that developed in Ohio and Maryland.

Mr. JAHR. That concludes the questions that I have for the witnesses at this hearing. If any of you wish to make any kind of concluding remarks, certainly feel welcome to.

[No response.]

Mr. JAHR. If not, on behalf of Senator Abdnor and the Joint Economic Committee, we want to extend our gratitude and appreciation for your appearance here.

The rural economic initiative has benefited greatly by your appearance here.

The subcommittee will stand in adjournment. Thank you.

[Whereupon, at 12:20 p.m., the subcommittee adjourned, subject to the call of the Chair.]

RURAL EDUCATION

MONDAY, JULY 1, 1985

CONGRESS OF THE UNITED STATES,
SUBCOMMITTEE ON AGRICULTURE AND TRANSPORTATION
OF THE JOINT ECONOMIC COMMITTEE,
Washington, DC.

The subcommittee met, pursuant to notice, at 10 a.m., in the Holiday Inn, Mitchell, SD, Hon. James Abdnor (chairman of the subcommittee) presiding.

Present: Senator Abdnor.

Also present: Mike Freeman, professional staff member.

OPENING STATEMENT OF SENATOR ABDNOR, CHAIRMAN

Senator ABDNOR. The Subcommittee on Agriculture and Transportation of the Joint Economic Committee will come to order. I have been looking forward to having this meeting out of Washington, out in the field where we could really hear from the people. This is as official as a bona fide meeting taking place in Washington, DC. We do occasionally take the committee out into the field. I would have liked to have been able to have other members of the subcommittee here, but they're scattered all over their States and districts, so we're going to go ahead with me, chairman of the subcommittee. I'm vice chairman of the Joint Economic Committee, back in Washington. That's made up of both the House and the Senate, and the chairman is a gentleman by the name of Congressman Obey of Wisconsin from the House side. I am the ranking member in the Senate.

The issue—the topic that we have chosen for the 99th Congress, that I feel is extremely important, is how do we revitalize rural America. Two years ago, I was chairman of the subcommittee, and we probably had the most complete and comprehensive hearings ever held on the subject of agriculture. We had over 200 witnesses and, I think, 4,000 pages of testimony that I turned over to the Agriculture Committee for their use.

We convened the first meeting this year in Freeman, SD, and these hearings, I think, have tremendous ramifications. These hearings have been taking place in Washington, DC, and South Dakota and are aimed at a subject that has critical importance, but that is looked at all too seldom in the Halls of Congress. That subject is America's rural economy, its problems and its potential, and believe me, since we began these hearings, a lot of people in Washington have begun opening their eyes on this issue. As vice chairman of the Joint Economic Committee, I am coordinating these

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hearings and intend to use them for at least very significant purposes.

First of all, I want these meetings to enlighten the rest of the Washington establishment that, yes, there is a rural America, and yes, we are having problems in what I've called the forgotten economy. The economic recovery enjoyed by most of America bypassed States like ours. That's why I coined the phrase "the forgotten economy." While the rest of the Nation talks about economic rebirth, we are faced with the death of many of our farms and our small businesses. The second purpose of these hearings is to take a step toward developing solutions for problems we face. In order to bring prosperity back to States like ours, we must develop long-term and not stop-gap answers, and the answers aren't going to come from the professional bureaucrats that have brought on many of our problems. It's going to come from the people who work and live in rural America, not those who write the rules and regulations for it.

Those are the two primary purposes in this project, and I believe we're seeing some success in reaching those goals. In fact, I think that's indicated by the fact that other officeholders in the State will be holding meetings just like these in the near future. I want to welcome members of this very worthwhile and necessary effort. Even before we began this project in Freeman in February, I realized that we couldn't look at these economic issues in sheer dollars and cents. We have to look at how these matters will affect our everyday lives. We have held recent hearings in Washington to determine how health care and other community services will be affected by our changing economic climate and resources. Today we will take the same look at the subject of education.

Let me make one point clear. It is a matter of principle in this country that citizens in rural areas should have the same educational opportunities as our urban counterparts. We cannot afford no less and we shall expect no less. The task is to maintain that kind of quality education system given the economic factors we must deal with. In many rural areas throughout the country, school enrollments are declining and tax bases are eroding due to the lack of economic resurgence in rural America. Given these factors, we must find innovative ways to maintain an educational system that is fair to our small communities, to our taxpayers, to the businesses that will hire the profits of this school system, and most of all, to our future generation.

We have the kind of witnesses today who will help us get started on that task. We are fortunate to have representatives of the South Dakota school administrators, teachers, school boards, and parents. The subcommittee's foremost interest today is to hear from these people who deal with the South Dakota education system on a day-to-day basis. I might add my own disappointment that the South Dakota Education Association wasn't able to send a representative to today's hearing. They did wish to participate, but many of their leaders are in conference in Washington, DC, today and they send their regrets that they could not have a representative present.

We are going to have to finish the hearing by noon today. Because we do need to hear from representatives of the various educational groups, we may not be able to get to all of you that would

wish to make comments here today. If we can't get to all of you, I do wish you would submit written comments that will become part of the permanent record of this hearing. I think I'm correct in saying that the record will stay open for 2 or 3 weeks.

I think there's a little misinformation on the news, that this was going to be an ag meeting. In no way was that the purpose. This meeting was set up well over a month ago for the purpose of education, and so that's why we brought the witnesses scheduled today, and I feel very fortunate that we have the kind of people who represent large groups in the educational field. We want these people to be very frank and, of course, there is not much we can do on a State level. That's a State matter, but we want to know how they see Washington, how it can affect their education, how they see education down the road.

Our concern is because the rural economy is so depressed. What effect is it going to have on education? This is kind of a free-wheeling meeting as far as I'm concerned. I came here to hear the educators, because I want to find some figures, facts, and possible answers when we go back to discuss this subject, and so I feel very fortunate in having Mr. Dennis Peterson who is superintendent of schools here in Mitchell who will be representing the South Dakota school administrators, and also Mr. John Sweet who is superintendent of West Central Public Schools. I've asked these two people to come to the table here and we'll wait to hear from them.

Gentlemen, I didn't give you many instructions on what we want you to say because I think you know a lot more about this subject of education and how it affects South Dakota and what South Dakota looks like down the road. So Mr. Peterson, do you want to start out?

STATEMENT OF DENNIS L. PETERSON, SUPERINTENDENT OF SCHOOLS, MITCHELL, SD, ON BEHALF OF THE SCHOOL ADMINISTRATORS OF SOUTH DAKOTA

Mr. PETERSON. Senator Abdnor, it's a pleasure to have this opportunity to speak to you about the problems facing rural education, because they are very closely linked to our most important industry in this area and that is agriculture. We believe that the economic conditions facing much of the rural Midwest and nearly all of South Dakota are placing stresses on communities and school systems that endanger the education of thousands of our young people. The heavy reliance on agriculture for our economic base and the serious problems facing that industry have caused a number of problems that will place our children at risk for years in the future.

A failure to adequately invest in the education of today's students will impair their ability to have successful careers. It will mean that those most likely to remain in this area will have inadequate backgrounds to meet the demands of the 21st century. In other words, they are not going to be able to compete with their counterparts in the rest of the country. The economic depression that we are feeling will be perpetuated by that fact.

Because we are heading into an era where education is going to be critical to everyone, there's every reason to believe that we are

presently underinvesting in education and that we will probably have even greater difficulty in years to come. A mood pervades our society that is negative in nature. Those most actively involved in agriculture fear their future. Senior citizens are fearful that taxes and diminished support for our social foundations will endanger their limited resources, and many of the rest of us fear the inevitable changes coming in our communities and State. Our general low morale has left us with a negative view of our present and future.

Without a positive attitude toward the present and future, it is difficult to convince taxpayers that we must continue to meet our obligation to our students. When people are deeply concerned with their own economic future, it is not logical to believe that they will enthusiastically increase their commitment to education despite the critical nature of that situation.

Compounding the problem is the demographic fact that only about one in four adults have children in the schools. That three-fourths of the population without direct involvement in schools have even greater difficulty understanding the direct link between our future and that of our Nation to the quality of education we can give today's students. We recognize that we all have a stake in education, whether it be our national defense, our national economy, our individual future, whatever, but sometimes it's very difficult to convince people that they have that kind of a stake in our—in the success of our schools.

The declining population of our rural areas contrasted with an overall national population growth and the declining birth rate have created substantial decreases in the student population of all rural districts. Several districts have closed their schools and a majority of our districts now operate high schools so small they impair the quality of education. And, this trend will continue as schools continue to be smaller. The stress placed on schools and their communities is enormous, for they are concerned with their very existence.

Senator, you know that the communities in our State have schools as the center of their very livelihood and as schools are placed under stress and disappear, the very heart of those communities is taken away. South Dakota has chosen to place heavy reliance upon the property tax to finance education. That tax is, of course, the most regressive and unfair tax used by States. That reliance on property tax has ensured lower expenditures for education. Since it is the most difficult tax to pay, it is also the most difficult to expand.

Falling land prices throughout our agricultural areas are leading to declining assessed and taxable values. This results in a smaller tax base for schools; and with a declining population, the tax load on those remaining in our rural areas increases at a disproportionate rate. This is in spite of the relatively small increases in spending for education.

This lack of adequate resources and diminished commitment has led to this state of affairs where South Dakota ranks 49th out of 50 States in teacher salaries. Low pay results in a failure to attract top students into teaching as a career. Further compounding that problem is that many of the top graduates from our South Dakota schools go to neighboring States where pay is considerably higher.

The eventual result will be less opportunity for our students to have their share of outstanding instructors.

Furthermore, since our administrators come from the teaching profession, the future outlook for leadership in our schools is in doubt. Many excellent administrators have also elected to leave the State due to low pay and diminished opportunities. If we cannot attract leaders of quality, vision, and commitment, our schools will not have a realistic chance for success. Senator, we have indicated many times about Federal initiative in the area of supporting leadership training and I would urge at this point that we continue those efforts in the Congress to gain support for leadership training and development. It's going to be essential to our State.

In closing, we are seeing the passing of a way of life that has been the bedrock of our State and Nation. South Dakotans have often sought all over the Nation because of their outstanding qualities. Much of that character has been built on hard work and positive attitudes toward life. It is more than sad to see this pass. It is a national tragedy. Thank you, Senator.

Senator ABNOR. Thank you, Mr. Peterson. I think it is a good kickoff and we have got the ball clearly in the playing field. Next we're going to hear from John Sweet, and while you have the Mitchell School District, John has a consolidated area and we are dealing more and more with that world, so we are real anxious to hear from John Sweet.

STATEMENT OF JOHN SWEET, SUPERINTENDENT, WEST CENTRAL PUBLIC SCHOOL DISTRICT

Mr. SWEET. Thank you, Senator. I come from a school district, as you know, that is partly rural, but we are also a part of the greater Sioux Falls area.

A gradual withdrawal of Federal assistance to elementary and secondary education in a State that has not experienced the economic recovery that the rest of the Nation has concerns me. Some evidence of this in our area—even though we are not as wholly reliant upon the agriculture-farming community as are other States because of the number of our residents that are employed in Sioux Falls, but the past year has evidence of this situation. We've had 51 percent of the students who participate in our School Lunch Program who have qualified for the free and reduced lunch which is for our situation, the highest that it's ever been, and I know that a larger percentage of those people could qualify if they would only apply. I think that speaks towards the status of the economy and how it has affected our situation in South Dakota.

I would also like to make mention of the point Mr. Peterson made concerning salaries in South Dakota for educational personnel. We recently completed the hiring process for an administrator in an administrative position, and we interviewed a number of people from out of the State who were very well qualified for this position and we're finding that teachers in other States are making more in 9 months than administrators in South Dakota in 10, 11, or 12 months. And it makes your hiring situation a little difficult when you're trying to bring in qualified people who are making

more than that in a teaching position and to get them to move, you need to, of course, offer more financial incentives.

Another area that I would like to speak just a little about is the special education in South Dakota and our school and many schools and the effects of Public Law 94-142 as it relates to the education of all handicapped people. I notice that in 1975, when this piece of legislation was before you, that you had some reservations about that, Senator, about the passage of that law, and I think that your concerns 10 years ago have now showed to be evident. I think your concerns at that time related to the Federal Government's ability to financially assist school districts in carrying out this mandate, and that has been the case.

The special education funding is causing a number of school districts problems. I don't deny and I don't think anyone will that the intent of the law is proper and correct; that is, providing all our citizens with free and appropriate education regardless of the handicapping condition or whatever is certainly in the spirit of American education. The local districts and also the State's ability to provide those services, however, are very expensive and has caused a number of school districts problems, and ours for one.

There's two problems associated with that. One is an inequity issue in that the handicapped are not equally spread throughout the population. Some school districts have smaller incidence of special education needs than do others, and the resources in those districts may not be as such that those needs can be met; and that's an area that there has been some discussion in Washington about trying to evaluate and maybe there's an area that could definitely be looked at.

The other problem was associated with the cause of some of those equity problems, which is strictly migration whereby people move to school districts who are offering services. So those school districts that have the services tend to generate more students and more costs.

Another area of concern that the Federal Government has been involved in is the Chapter One Program. We need to continue, I think, to fund that program. The research on it shows it to be effective and it's another area that concerns me with what I think is the gradual withdrawal of Federal assistance to elementary and secondary education.

Another area of concern is what I consider to be the gradual withdrawal of funding for vocational education. We are seeing that and we feel these perhaps are important to South Dakota, especially rural South Dakota where we do have a lot of these programs in our schools, and it's something that I think warrants your consideration.

And the fifth area and the last thing I guess I'll speak to is more good news so far than bad, and that's the chapter II program, the chapter II block grant proposal, and I think they used this money currently for implementation of computer programs, the purpose of equipment and other high technology kinds of things, and that program has been served very well and I would urge that you continue that program as it has been.

That concludes my comments.

Senator ABDNOR. Well, thank you, both of you gentlemen. Let me ask you for a starter, do you think that the Federal dollars that we are presently appropriating and sending back for education under the formulas are fairly distributed?

Mr. PETERSON. Well—

Senator ABDNOR. I mean, nationwide. Do you think there should be a formula?

Mr. PETERSON. I think the basis for most of those formulas does direct the money toward urban areas, and I recognize they have their problems, too, but chapter I, for example, there's been a substantial shift away from rural States like South Dakota toward the urban areas. The vocational rules have been rewritten basically to direct that money to the urban areas, and we really have a great difficulty of living with the new vocational program the way it's established. We have got a lot of stress here in our system.

Senator ABDNOR. In Mitchell?

Mr. PETERSON. Yes.

Senator ABDNOR. We're going to have people go into it later on. Let me go specifically to the formulas. This is a major issue. This is not solely an education issue. I had a hearing with this very subcommittee back in Washington, with the Department of Labor, Bureau of Labor Statistics, and we agreed. The lady, Janet Norwood, who heads this up, admitted that those figures that we report to you every month on unemployment don't relate the real picture for States like South Dakota. They have no real measure. They don't pay enough attention to it, and this is a constant problem. It's not going to be an easy one, because I even got into it with the HUD programs. But when I think of all programs—I mean, certainly housing programs are needed—I don't know of any that are comparative to education. That is why we're holding these hearings today. You both seem to think that things like that depend so much on the tax base eroding. I hope it starts coming back up, but what's the Federal Government put it, 12 or 13 percent on the average?

Mr. PETERSON. I don't have that statistic with me, but I think it's lower than that at this point in South Dakota, particularly—

Senator ABDNOR. Oh, yes.

Mr. PETERSON. And particularly if you take the Federal impact on the districts, it really is very little Federal aid.

Senator ABDNOR. Well, you mentioned impact aid. You know, one of the biggest problems I have with that impact aid is some of these people in Washington remember how it was patterned for years to take care of the three richest counties in the United States. They don't need that kind of aid, but still it's hard to pattern a bill that will really get to the heart of what the problem is, and this is something we have got to try to overcome and one of the things I hope we're trying to get to here. They give us the facts and figures and we hope to get more as we go on because I think the need is going to be greater.

We've got three levels. You've got the local; you've got the State and you've got the Federal, and I guess the State is putting in more of their share, have they not?

Mr. PETERSON. Well, basically the increases are coming from the local level because the State increases have been certainly below the cost of living for most schools.

Senator, one other program I want to just comment about because it is a partnership between agriculture and the schools and that is the School Lunch Program. It appears to us that they're gradually pulling out of their support for agricultural commodities and that they're going into more money rather than commodities, and it would seem that that certainly is not going to be positive for agriculture to not be providing commodities for the schools and of course, it's not positive for the schools because we have done very well with those commodities in making them stretch and save the taxpayers money.

Senator ABDNOR. Do you feel the same way?

Mr. SWEET. Yes, I definitely do. When it was formed in 1946, it was formed for two purposes; one, to provide nutritional needs to the students of our Nation, and second, it was a method to disperse agricultural commodities with the benefit to go to the agricultural communities. So it's been an excellent program.

Senator ABDNOR. I don't know why we got off on this dollar thing and commodities itself. It's something I think we let happen too easily down there and I'm glad to get your thoughts on it. What would you do if you were a Member of the Congress in this committee to get those significant, important things of concern? I guess it's in dollars; is that right?

Mr. PETERSON. We can, I think, provide a relatively low economic area with some support for ongoing programs that happen throughout the rest of the country.

Senator ABDNOR. Well, we've got to move on here, but we might be submitting questions in writing. Vocational education, this is one thing we need to keep going in South Dakota. How has it affected your school, your vocational education in Sioux Falls?

Mr. SWEET. We have some programs in our school. Those enrollments have been declining somewhat due to emphasis on other areas and other requirements for graduation. However, those programs are still very important and there is a number of various—there's a need for that program and, however, as Mr. Peterson stated, the new Federal system for funding that thing is going to cause some stress and it appears to us that the Federal Government is backing out of their support for vocational programs which includes vocational agriculture which has been a very excellent program.

Senator ABDNOR. Well, I don't want to get into the State end of it. Has that had some effect on the vocational education in your school, too?

Mr. PETERSON. The changes of the Federal statute?

Senator ABDNOR. The State.

Mr. PETERSON. The State has helped pick up some of the load.

Senator ABDNOR. Well, has that had much of an effect on what happens in vocational education?

Mr. PETERSON. Well, we think in postsecondary schools, it could have a positive effect that it could drive more students to the vocational route rather than the college route.

Senator ABDNOR. Would you agree with what John said on special education?

Mr. PETERSON. Absolutely. That's a great need, and of course, as he pointed out, one of the problems with that is the better you do in that, the more you have to make commitments to other children that move into your community.

Mr. SWEET. Senator, if I could say, you asked the question if I were sitting in your chair.

Senator ABDNOR. Yes.

Mr. SWEET. One of the things I would really encourage you to get involved in is what's going on with Public Law 94-142. I think that the Federal Government is revising some of their rules and regulations concerning that law to make it easier and programs ultimately less expensive for local school districts to deliver appropriate educational service and I think we all agree that we need appropriate educational services for all students regardless of their handicapped condition or not. The impact of Public Law 94-142 I don't think has been totally felt yet. It's 10 years old. It was November 1975, when President Ford signed that bill into law. I think that we might see that that piece of legislation is going to have a bigger impact on education than any law ever passed. I think that we might see how that particular mandate has served education very well and how it might have a very large impact on what we might call general or regular education and some of the provisions within that. I think it's something to keep an eye on, and I think that like I say, the impact of that on total education is yet to be felt.

Senator ABDNOR. That's good.

Mr. PETERSON. I think also just a caution on that particular statute. It's another example that we feared going to Federal funding of education, that we would get their fingers around our throats in other areas and they have used that law to make us do things that we probably wouldn't have had to do otherwise. So those are some of the concerns that the bureaucracy forces upon us, so we have to watch that.

Senator ABDNOR. We should be more alert to that. It's such a big and expensive deal that if they ever started that, they could make life miserable for you out here, and so I have got a lot—well, gentlemen, we do have a lot of questions.

Mr. SWEET. I would just like to say thank you for inviting us and I would also like to part with two other areas that I know you—that had an impact on the South Dakota schools and one is the asbestos legislation and the Loan Grant Program that I think you were involved in. A number of students from South Dakota visited Washington, DC, for a week and it's just been an excellent experience for them and an excellent program and we appreciate your assistance in getting us involved in that.

Senator ABDNOR. Well, I'm very grateful for that. I think it's good for the State and for the program to have South Dakota into it. That asbestos program just scratched the surface, but we're making solid headway and it seems like most of the Members of Congress are now getting behind it. I thank you for your nice words.

Our next witness is Sam Tidball, Association of School Boards. Sam, we really welcome you to our hearings today because I know

the Association of School Boards and I met many times with your people coming in here that are coming to Washington, and I don't know of anyone that works harder for the good of education than you and your people.

STATEMENT OF SAM TIDBALL, ASSOCIATION OF SOUTH DAKOTA SCHOOL BOARDS

Mr. TIDBALL. Thanks, Senator Abdnor. We appreciate the opportunity to offer some comments at this particular session. I know it was—you made some comment about agriculture, that this hearing centered on agriculture, but certainly in South Dakota, education and agriculture are so closely tied together that you probably couldn't talk about one without talking about the other because of that fact. Now, South Dakota may be somewhat unique in that our economy is in trouble, but because we are wholly dependent on agriculture, we are in greater trouble than many would judge, and it's true that a few bright spots can be found out in our economy. We seem to be doing pretty well in our tourist industry, and we have some new, other industry in the State, but for the majority of South Dakotans, farming and ranching is the main industry, whether it's main street business or actual farming and ranching. And in our school districts, it's the taxes on land that's the basic supporter of our schools, and if it isn't taxes on land, it's taxes on other property, other real estate. So that certainly is important to us.

The high interest rates, of course, in the recent past have caused a lot of our farmers and ranchers serious problems and it's especially true for young, beginning operators, and many of them are able to continue for a time because of the equity they had in the land, but even the interest rates have fallen somewhat recently. Our land prices have also drastically dropped and a lot of the people in that drop in value have lost their equity in the land. So a lot of those people are out of business and others will be soon. We've been through these kinds of times before in South Dakota and I think back in the—during the Kennedy administration, it was stated by someone in the administration, whether President Kennedy himself or not, that one of our problems with agriculture was that we had too many farmers.

In fact, the statement was made that we had 1 million too many farmers and that it would make a difference if we didn't have quite so many, but we lost a lot more than 1 million farmers. We have lost several million in that interim and we are still in trouble. And the point I want to make is that economic conditions are serious and they are changing the face of South Dakota.

In our schools, in our public schools in South Dakota in 1980, the fall enrollment was 128,400 students. In the fall of 1984, it was 122,800 for a decline of approximately 5,600 students. Now, in some States, 5,600 students wouldn't make much difference and maybe in South Dakota it shouldn't be considered a drastic thing; but in a State where the median high school—the median high school in the State is 100 students or approximately 100 students, median enrollment in high school, I know in some States that would seem like that school wasn't worth fooling with, but in South Dakota, that's our median high school enrollment. Of course, we can say

the economy, the declining birth rate, and we have some other factors, but it wouldn't be so alarming even in South Dakota if it weren't for the fact that the small, rural communities is where the decline is the greatest, and our smaller schools and, in fact, our smaller towns are disappearing.

In many, many of our smaller towns in South Dakota, we don't have really what you'd call a business district anymore. There's still some people living there, but for the most part, it's not a widely thriving town like it has been. And Mr. Peterson referred to the fact that we have had some schools close. Well, I think, in fact, eight in the last 3 years have closed their high schools in South Dakota. And again it was mentioned that that's kind of the life blood or the heart of that small community and we have got a number of others that are very close behind.

We have many schools in many communities in South Dakota where the high school enrollment is under 50 and declining rapidly. So it's not a question of whether those schools are closed, whether they probably should have closed or not because they just simply ran out of students, and I think that's a point that we need to be in consideration of because when the school closes, our small towns are right there with them either before or after. The town loses its life, you might say, and where agriculture is the backbone of our economy, there's another serious problem in some of our school districts.

We have large acreages in South Dakota of Indian lands or of forest lands, of lands purchased by the Federal Government under the Land Use Act and other properties that are either in trust or controlled by the U.S. Government which are not taxable on the local level, and as a result, some of our school districts have a very small tax base to support not only education, but other local governments. But there are some limited programs that help and we especially appreciate, Senator Abdnor, your efforts in maintaining some assistance in the area of impact aid. We were really in serious straits without this effort that you made, and that was no small effort and it made a great deal of difference in the ability of those affected school districts in continuing essential programs.

It was, however, we considered, a pretty serious blow in South Dakota to a number of school districts when the U.S. Supreme Court decided that in lieu of tax money on Federal lands need not be shared with school districts, and we thought we had the perfect solution to that in South Dakota, distributing that money under a State program that would distribute it the same way as taxes are distributed.

Now, personally I am not in favor of the Federal Government assuming a lion's share of the cost of education because I think that we can anticipate if that's done, that we will not have much say on the local level and we would certainly like to have people involved in the local level in the management and operation of our schools. However, I do believe that there is a strong responsibility for Federal help where Federal land is involved and I know that you mentioned this previously in some comments with the previous witnesses, that you had some concerns about how that impact aid was distributed previously and how unjust it was and where it wasn't needed, and I think that's true.

We also, of course—we have in South Dakota—we have some duplication of effort in education. We have the Bureau of Indian Affairs operating in the same areas as do public schools and it would appear that greater economy and perhaps even better education could be provided if we had a somewhat more simple approach to Federal assistance in financing education where Federal or trust lands are involved, and I suggest that if we had some kind of a tax replacement for that implemented and we could eliminate the duplication, I think that both the taxpayers and children would benefit. We could eliminate that problem of having money going where it wasn't needed so badly.

Maybe we even need to have the money for the impact schools program, maybe that could come from some other approach where we have military installations; it might be that maybe through the Defense Department to support those programs would be an important change there, and I know, you know, we have seen some things happening on the Federal level. The consolidation of some of the Federal programs a few years ago where it was put into the block grants, that was actually beneficial to South Dakota and we certainly think that the money is being used more effectively because we have more control over some of those programs. Some of the programs we couldn't have participated in in South Dakota, but under that consolidation, we are able to. And so we appreciate that effort that was made on the Federal level.

As I mentioned, we are hurting in agriculture and that affects almost everyone in our State. We are doing a good job of educating and also supporting our children. Our young people and our standardized test scores rank our students at or near the top in every category on a nationwide basis. At the same time, we pay our teachers and the administrators very modest salaries in comparison to other States. This is essentially true, especially true in our smaller rural communities, and so the reason, of course, is the economy of rural South Dakota is in trouble. And generally, we believe that the free marketplace where competition sets the price is the best approach, but we have to face the fact that where agriculture is concerned, the market doesn't set the price. The governmental subsidies do, and if not in the United States, certainly by other countries.

I know that you're very much aware of how much subsidization is undergoing in countries that we trade with and have a trade policy that certainly hits us very hard in our economy in South Dakota. So I think it's very important that we negotiate an effective worldwide system of trade, otherwise, agriculture may very well go the way of our steel mills, our shipbuilding, our clothing manufacturers, and what we've recently seen in automobile production. So I think that we need to look at, of course, some things that help, and the lower interest rates are helping, but they are still too high. And we need to have a fair marketplace and a fair profit for agriculture. I think that's necessary, or we got the problem that the rural area will simply continue to shift to the towns and people move from the farms and ranches.

As you were discussing earlier about the fact that some discussion on the funding is more beneficial to larger population centers, we have seen that shift in the past and we continue to see that and

we think that shifting of the moneys there or saying that the money needs to go there because we have so many problems. We are sending out people that have problems. So we would hope that we could see some changing in that.

I certainly appreciate the opportunity to offer you some comments. We commend you for your good support in South Dakota both in education and in agriculture and we look forward to working with you in the future.

Senator ABDNOR. Well, thank you, Mr. Tidball. I appreciate the comments and I hope I didn't—when I said about not an agricultural meeting today, I didn't mean that my great concern isn't agriculture or that agriculture is the key to education. It's just that I didn't want to get in the farm programs today when we're on the subject of education. You bet, the ups and downs of some of the farms—I can't think of anything that has had a more tremendous effect, at least out in 75 percent of our schools. But, fortunately for you, you would be in a bigger mess today if farm values had dropped as much in South Dakota as they have in Iowa or in other places.

How do we keep our schools open and give the young people the same quality education that they have been getting? How can our schools continue on that way with the pressure they are under? Are you finding some of these same problems with special education? Is that a problem in general throughout your school?

Mr. TIDBALL. Absolutely, and we know that when Public Law 94-142 was passed, that we were pretty well assured that there were going to be some increased funding for the special education. That hasn't really occurred as far as the per-student basis is concerned, and that is, of course, one of the problems. It has certainly—certainly we are not saying that we shouldn't have the law, we shouldn't be giving those people that opportunity, because we know that in South Dakota as in most States, we're not giving adequate attention to the people that are handicapped. So we are not saying we don't want to give that attention to them. We just say that that sure would be nice if we could get a little increased assistance there in that area of special education.

Senator ABDNOR. Do you think the law itself should be relaxed in some areas?

Mr. TIDBALL. Well, there are some things that I think this law—probably the interpretation and regulations that were adopted for the State agencies, the interpretation of what is really—what would be related costs or related responsibility for education, that's where we think that the inequity is in the law is that the interpretation of it on the Federal level has caused us to provide so much medical service to children, even preschool children, that—and certainly they need the assistance. The families need the assistance that have a child that has that kind of disability, but to lay that out on the property taxpayers in the name of education is a little bit difficult for us to handle.

Senator ABDNOR. Well, I think the time is going to come that somehow, some way, the Federal Government and the Congress is just going to have to realize that problems like South Dakota's must be confronted. It's not always an easy thing to sell and that's what we are trying to do in this subcommittee, to disseminate some

of the information we are getting. Hopefully we can get our story told because it's just natural for each State to hang onto everything they have, and I'm assuming that the advantage has been to the more urban areas, and somehow, some way, we still believe strongly in the quality of education and we have exhausted the State and local levels. It's got to be looked at in a different light, but we need all the help in the world we can get to do that.

Mr. TIDBALL. I think it was of interest, Senator, and recently I read where in one State—and I can't remember for sure which State it was, where they were recommending that there not be any high schools with fewer than 500 students. We went through that whole study about 30 years ago or so—maybe it isn't quite that long, and recommending that you not have a high school with less than 500 students, well, that's totally ridiculous in a State like South Dakota because if we did, we would have to transfer students a couple hundred miles. So it wouldn't work, and we have different costs that other states just can't comprehend, and I know that makes it difficult for you sometimes in the Congress where you have so many people that are from more populous States and I know that's difficult, but in South Dakota we do have some of these problems.

Senator ABDNOR. Let me ask you a question not directly related. What kind of effects are there on a community when a school closes down?

Mr. TIDBALL. Well, generally speaking, when the school closes, you remove the center of activity of that community and consequently, you also lose people because people will move somewhere else; not only, you know, because of the fact the school closed, but because they want to be where their children are and be participating or involved in the activities and so forth related to the school that their children are involved in. So certainly it has an adverse bearing on it. There's no question about it.

Senator ABDNOR. You were talking about the Federal replacement tax. That is a problem and the law was intended for that money to go back for education. Let me ask you, is that left to the discretion of the county government to determine if that—

Mr. TIDBALL. It's left to the discretion of the county commissioners now.

Senator ABDNOR. Are they showing any willingness to—

Mr. TIDBALL. They are come and there also has been some—in all fairness, there have been some counties that distributed it very fairly. In others, they strictly use that money to operate their own budget and consequently lowered their—and it would indicate then that the big problem for taxes was not with the county, it was with the school district. So it made ill feelings in some instances. So we feel that our approach in South Dakota was the best approach, distribute it as other taxes on that same basis and it worked, we thought, quite well, but one county decided that they should take it to court and as you know, the result was that the Supreme Court said we can't do that. We may be talking to you more in the near future about that. Perhaps some small change in the Federal legislation might be made.

Senator ABDNOR. It's got to create a tremendous problem. Some counties must have at least a third or half of their land—is that an exaggeration?

Mr. TIDBALL. No, there's—we have, of course—yes, there are school districts where the Federal land in that circumstance is a major portion of land, that's right.

Senator ABDNOR. I wouldn't quarrel with that. Maybe the counties are entitled to it and we'd better find out because the schools have got to have some, too.

Mr. TIDBALL. That's right.

Senator ABDNOR. That's what it consists of.

Mr. TIDBALL. But where both the county and the school districts rely on that property tax to support their governments or their operations, why, we think that this should be a share process. We have some other programs, of course, where there's some timber and so forth where we share the income, but in this instance, counties where the commissioners are willing, they get some money; others they don't.

Senator ABDNOR. We have to go through with the impact aid. In this case, the Federal Government was not that eager or willing to admit that they had a problem. Half of it was selling and getting our story across at least—like the reservation lands, the Indian lands where it's not taxable and something has got to make it up. I think the Todd County School District, that two-thirds of the land down there is nontaxable.

Mr. TIDBALL. That's right.

Senator ABDNOR. And it's an awful load on the owners of the land to try to carry it.

Mr. TIDBALL. We have a number of school districts in South Dakota that the majority of the land or there's more land that is reservation or Indian land than there is that is taxable.

Senator ABDNOR. The Bureau of Land Management has land and forestry land and Park Service and put it altogether, it presents a real problem. How many schools are under 50—how many high schools are under 50, so we can talk about which way we're going for the future?

Mr. TIDBALL. I don't know whether I brought that specific information. I can send you that information, but I just didn't bring it with me.

Senator ABDNOR. Well, I'm sure we have a lot of other questions, but I think we'd better move on here. You have come a long way and I appreciate it very much. We may be asking you some questions in writing.

Mr. TIDBALL. Certainly.

Senator ABDNOR. Thank you very much.

Mr. TIDBALL. Thank you very much.

Senator ABDNOR. Our next witness is Mrs. Dorothy Dubs of Huron who is the South Dakota Teacher of the Year. Please let me congratulate you. That's a very distinguished award and we appreciate it. I couldn't think of any better person to hear from than someone who's been selected as the outstanding teacher of South Dakota. I thank you for coming and giving us the benefit of your ideas.

**STATEMENT OF DOROTHY DUBS, SPECIAL EDUCATION TEACHER,
HURON, SD**

Mrs. DUBS. Thank you, Senator. I'm from the Huron Public School special education staff and I do welcome this opportunity to tell how we are attempting to serve the needs of each student with quality education. As classroom teachers, we are aware, of course, that there are regulations imposed by the law and also regulations as a result of receiving funding. Our director of the special education strives very much to keep the classroom teacher, the special education teacher informed of the financing, and I wish he were here to help me adequately present the administrative viewpoint.

The public law that has been mentioned in previous testimony this morning, designed to help provide children with individual differences so great that they need specifically designed instruction, has some major differences from our State according to the national law. The South Dakota law states that the severely, profoundly handicapped students from birth to 3 years of age must also be served. The Federal law includes them starting at age 3. The South Dakota law indicates that the population of handicapped students served do not have to be identified by categories. This means that South Dakota is one of the few States in the Nation that is noncategorical in terms of student identification. Reimbursement for State aid is according to the amount of time and services that a student needs to be served appropriately; in other words, how much special education assistance the child receives.

Also in South Dakota, the education for gifted students is identified as a special education service for funding purposes. The same procedures are required in providing a free and appropriate education for all of the special need students, and at a spring South Dakota special education conference, a member of a parent-teacher panel brought out that she, as a parent of a gifted child, must also deal with unique handicapping conditions such as acceptance, and this is an area of our student population that is often not included when thinking of special needs. Our local total student population of about 2,400 students has a full- and part-time special education staff of 25 to meet their needs as well as those of the tuition students that we receive. We have eleven special education programs and four part-time services of work-study, adaptive physical education, occupational therapy, and physical therapy.

The cost to educate a child in need of special education varies considerably depending on the type and amount of service the child needs. For example, the yearly cost to serve a child with a mild articulation problem could be approximately in the area of \$500. The cost to the district to provide services to a more seriously disabled student could be approximately \$17,000 per year. We are within the area of finances once again as we strive to meet the needs of a special education student in a rural State.

Some concerns that I have as a classroom teacher are the following: There is a lower incident rate in rural areas, so the education costs are higher per child in isolation than for a child in an urban grouping. Also, there is a lack of evaluation resources to provide total assessment of the child insofar as possible. The total picture is needed, and we may require a neurological, medical, psychological,

educational, and social evaluations. These complete evaluations are not often feasible in our rural areas. The question is then raised, how do we provide the free, appropriate education that is assured by law?

Closely meshed with the need for evaluation resources is a need that we have more cooperation among agencies such as community counseling, social services, and the schools. We don't need duplicate resources. We need effective use of what we have available.

And then inseparable from the previous two concerns is that concern that was alluded to a little earlier this morning. How far, how much is a public school responsible for special education needs such as those of the profoundly or severely handicapped? Again, interagency teamwork is needed. We have been fortunate locally to have some stability within the leadership of our schools, communities, and State agencies, and therefore, this working relationship has been strengthened yearly, but this is not the situation in many cities and towns or the more remote areas where demography separates students and resources.

We need to identify with the urgency the family of a child with special needs feels. We need to educate these children today so they have the opportunity to be functional in their tomorrows, and South Dakota is not escaping the increased population in need of special education services. We too are experiencing societal change: The alcohol field syndrome, the abused child, the foster child, the child of a single parent. Neither are South Dakota teachers unaware of the needs of students and of good educational methods. Many of us are also aware of the controversy of special education and responses by some Congressmen and the Secretary of Education.

I have personally taught the classrooms where there has been no special assistance available for a student. I have taught in classrooms where students have left for specific periods of time for assistance. Then on the other hand, I have been a special education teacher who has worked with designated children either in the classroom or out of the classroom. I'm currently a teacher of students who are mainstreamed into the regular classroom for mainly nonacademic areas. Ideals in reality are often figuratively and literally miles apart, but shouldn't the rural first grade girl with articulation problems so severe that her classmates can't understand her have the opportunity to become an articulate person just as much as her peers in a city miles away where special services are provided?

There are 24 hours daily for all of us, and when I was working with a student such as this, reading books, making plans on how to teach this individual girl, I was not using those same hours, of course, to prepare for the rest of the class. From personal trials and successes, I am an advocate of special education. I would invite those responsible for distribution of funds to get at the heart of the needs of our rural students, talk to the students, not just about them; to parents, friends, educators, and school board members. If we don't continually plan how to effectively and conscientiously provide money for education of our people, where are our values and hopes? I thank you for inviting me today.

Senator ABDNOR. Well, we certainly thank you and are very grateful to have you appear. I couldn't think of anyone we would rather hear from, and I guess it's very apparent from your statement why you are teacher of the year and have great concern and interest in the field that has already received quite a bit of consideration today. Just on the field of special education, putting yourself in my place, what would you do other than more dollars? Is there anything that can be indicated or done that would help the situation?

Mrs. DUBS. Well, of course, like you said, more dollars would help. I think the freedom insofar as possible for us—not for the classroom teachers necessarily, but for the special education services, for the school administrators to use this money as they see fit. The needs of our districts vary so greatly that it's very difficult to say this is how it will be spent to best provide. As a classroom teacher, it's on my conscience heavily when the parents know somewhat of this law and they have the idea and rightfully so that the Government says their child will be educated appropriately. And then when we don't have the available resources such as I talked about, evaluating these children, how can we serve them unless they are indeed evaluated correctly, or if the money is tied so tightly to a certain way that we aren't free to use it to meet the deep needs of the district that we are in.

Senator ABDNOR. Does every grade—1 through 12—have special education? Do some schools send students to other schools?

Mrs. DUBS. We have tuition students from a few districts that come to Huron because we are a larger community and the staff is there.

Senator ABDNOR. Do you find a migration of people with these students moving into Huron, for instance, to take advantage of it?

Mrs. DUBS. There has been some. Our special education administrator did a survey of that and there have been some students who have moved there in order to receive services.

Senator ABDNOR. I don't know how you would establish that, but that does make a great load upon a school district.

Mrs. DUBS. Yes.

Senator ABDNOR. I suppose you could almost come up with a proportionate percentage of a hundred kids, how many are in special education, but when they're moving in, it far exceeds that, so it is a problem. I don't know any quick answers, but it's something that should be looked at as we get into this. Let me ask you, there is a lot of emphasis being placed on child abuse these days out of Washington and elsewhere. A lot of it's being uncovered. Is that having any effect on the number of these kids that are coming into the special education?

Mrs. DUBS. We are working with more and more as I look back even just in the past 10 years. The apparent need to reach these children who are abused is just as obvious. You cannot just suspect that it is there. It is very obvious and again, you know, we are required by law to report suspected abuse or neglect, and then again this involves what I had mentioned earlier, working with other agencies, and I think it's important that we're talking about the child, but also the family, the feelings of the parents involved, the agencies that we have to work with.

It all takes time and we need to keep working; that I know. There will never be something delineated right exactly down as to steps to do, but in the meantime, these days, months, years are going by literally where we are trying to help this child and they are growing emotionally and socially and educationally during that time that we're supposedly trying to figure out the best needs, the best ways to meet their needs. I have a real concern about that, that the law isn't just a comfortable thing offered, that we are effectively carrying it out. I don't think we should say we are doing more than we are.

Senator ABDNOR. It's a good point. Is the problem of drug and alcohol getting to be a greater problem in our schools?

Mrs. DUBS. I have been involved mostly with the elementary-school-age group. I have not seen an increase in it there, nor have I heard in our local district that it is more so in the middle school and high school. It seems to be more the post graduate—the graduate of high school, excuse me, that we're talking about, but it is available in the elementary schools where I'm working. It has not been a problem in education of them. We are more openly teaching about it, though.

Senator ABDNOR. I think it's like a lot of America. I used to think we are above that, that it would never happen in South Dakota, and I know nationwide it's getting to be a tremendous problem, and alcohol and drugs are getting clear down to the junior high level. As a matter of fact, I am chairman of a subcommittee of the Appropriations Committee that handles all of the Treasury and White House budgets and a lot of other agencies. In that committee, we deal with the Bureau of Alcohol, Tobacco, and Firearms and the problem of alcohol and drugs on the border. I guess if you're really going to help, they say you've got to go down to the earlier years of age.

Mrs. DUBS. Right. We do know all through the elementary school, the children are more open than they were even 5 years ago. They have seen the use of drugs and alcohol. I have no doubt in my mind about that, because when we do our so-called units or talk about this during the year, they're asking questions and stating things that children that age 5, 10 years ago did not have access to the actual use of these drugs.

Senator ABDNOR. It's getting to be a big, big problem and I hope to be doing some work on it. Well, we thank you very, very much for coming this morning, and again I want to warn you, we may want to submit written questions.

Mrs. DUBS. And I would invite you to do so and I have some good help at home that would provide you with information.

Senator ABDNOR. Thank you very much. Our next witness is Mr. Dawn Nerison of Aberdeen and he's a representative of the South Dakota PTA and I think he is soon going to be the president and is vice president now.

Mr. NERISON. President next year in October.

Senator ABDNOR. You know you had to get up early to come all the way down from Aberdeen. I saw him earlier in the restaurant about 9:30 and that means he did leave Aberdeen very early.

Mr. NERISON. Left approximately before breakfast.

Senator ABDNOR. Well, thank you for that effort and that's very important to us to have you here and we thank you for coming. Go right ahead.

**STATEMENT OF DAWN B. NERISON, FIRST VICE PRESIDENT,
SOUTH DAKOTA STATE PTA**

Mr. NERISON. Senator Abdnor, the South Dakota PTA thanks you for the opportunity to appear here this morning. We represent the children of South Dakota and we have about 7 thousand members. The South Dakota PTA is very much concerned about several agricultural programs within the State and some of the programs that will be developed later on. We feel very strongly that the school lunch program should be continued and it should be continued with commodities as shipped, away from the idea that the farm population furnishing supplies can be substituted for money.

Senator ABDNOR. You feel that commodities are the best approach?

Mr. NERISON. That's right. It helps everyone along the line because here in South Dakota, we have a declining economy. We also have farmers who are having a very difficult time at the present time and we feel that this shift would help them, and we are also real concerned about the Federal aid to education, block grants that the Federal Government has been giving to the States. We are also very much interested in the fact that the Chapter One and Chapter Two programs of the Federal Government ought to be continued. It appears that these programs basically are on their way out or reduced, and we feel very strongly that the aid to education in the State of South Dakota as well as in the Nation is very much concerned with the national defense program.

We must have an educated population. We must have a population of people who are educated and able to do things that are necessary. We also recommend that we have adequate salaries for our school personnel because that's very, very important.

Another thing that I want to talk about a little bit today is the idea that the state and local taxes that people pay here in South Dakota and throughout the Nation, the impact is not as great here in South Dakota as probably it is in other areas, but we feel the elimination of the State and local tax on the new tax proposal would have a harmful effect on education in South Dakota for several reasons. The South Dakota PTA speaks for the children of our State and we feel that they deserve the best education as possible to give them. We must remember our schools are primarily supported locally. The elimination of this deduction would assume perhaps that the Federal Government is primarily responsible for education on the local level which it supplements, but it does not totally support; I mean, totally pay for.

We in South Dakota believe in local control and the taxes levied by our governing bodies are close to the people and controlled locally. If our boards of education or the local officials levy the tax, they have the opportunity of saying where it's going to go, what it's going to be used for and so forth. If these taxes are not deductible, our boards would be reluctant to levy and raise taxes for the support of programs because of the concept of double taxation.

Over the long term, we feel the impact of eliminating the State and local taxes would be a stifling effect on local, and State initiative and for reform and implementation of education. Education in South Dakota has been improved through the last few years, but we all must remember there is a limit to—in a rural State like ours, to the amount of taxes that an individual can pay. Therefore, the elimination of the deduction of State and local taxes would be another block to the type of education that we believe is necessary for our students here in the State. We feel that the elimination of the deductibility of State and local taxes would be a definite hindrance to the education in our State.

We also feel that Federal assistance to education is limited basically to two programs such as direct grants or loans for programs and services and indirect assistance through tax deductibility. Many people don't realize the fact that if I deduct my taxes on the Federal level, I can then use it as an indirect assistance to the local schools or communities.

In order for children to receive a well-rounded education, parents need to be able to purchase homes and remain participating members of the community. In my years of educational work, 33 years in the Aberdeen Public School System and several other places, I found that where people were a part of the community, their feelings toward education was different than people who come and leave the community. They need an incentive to purchase a home and to be able to deduct these taxes on their home and for the future and that's important. This ownership gives them a feeling of belonging in the community. Therefore, we support Senate Resolution Number 82 and House Resolution 105.

In conclusion, we feel that education is our first line of defense and therefore needs to be treated as a part of our defense program. We feel education should not be treated any different than our defense program is treated. If that receives a cut, our educational programs perhaps would need a cut. We must remember that education encourages State and local governments to meet the needs of their citizens and discourages them from relying on Uncle Sam to meet those needs. We in the field of education feel very strongly that we must continue the program of excellence in education so that our next generation will be able to prepare our youngsters to make them the best resources possible. We would also like to mention the fact that we should spend more time looking over the material, the material called "A Nation at Risk" because education is the first line of defense and important to that.

In conclusion again, I want to thank you for the opportunity to appear here today and bring you the ideas of the State PTA.

Senator ABDNOR. Well, thank you very much, Mr. Nerison, for coming all the way here and presenting your excellent testimony. I, in no way, want to downplay the first line of defense because I know that young people are the most important thing that we have in this country, but the other thing I would point out is that defense is the sole responsibility of the Federal Government. I mean, the defense of the Nation was one of the first things, one of the three basic things the Federal Government was supposed to do.

Mr. NERISON. And rightly so.

Senator ABDNOR. But I am glad you brought up taxes because that is a big issue. I personally have been in the Appropriations Committee the last few weeks and now we are going into conference on that and we, of course, have a budget resolution, and I don't mind telling you I am very unhappy with the President for introducing that tax bill at this time. The most important thing we can do is to come up with a decent kind of budget.

We want our farmers put on the same line as the schools. We can get the interest rates a third less, at least 3- or 4-percent less, if we got our dollars back in line so we can sell something overseas. It would do more for farmers and schools than anything I know of, and we are making some headway, but the moment the President put in this new tax bill, all the attention has gone to the tax bill. We don't hear anything about the budget and that disturbs me very, very much and I have told the White House that, because we made some very tough votes that we wouldn't mind making. But now we may never get another chance because now all the attention is the other way.

You're talking about taxes. I can certainly see this in New York, but I was a little surprised to hear about South Dakota because the farmer is going to get that tax deduction as a deduction off his income tax at best. He would lose his house.

Mr. NERISON. That's right.

Senator ABDNOR. But if you put this squarely to the average person, what little I have seen at least on this end of it, an average family of four gets another 4 thousand dollars' worth of deductions because of that and a lower tax rate. You might be surprised. I have never really balanced this out yet and it's something I want to look at very carefully. I think the other area that is going to be important for farmers and agriculture is going to be the loss of investment credit. I think they are doing away with the accumulated interest and it looks to me like a very complicated formula for trying to figure out depreciation on the rest of your equipment. Things like that have really been a disturbance to me on the tax bill.

Has Mr. Tidball left? What do you think, Mr. Peterson? Of course, you are right here in Mitchell where you do have a lot of property tax and your school district has a bigger population. Do you think that will hurt this tax provision; this tax provision will hurt indirectly education, the inability to take off property tax on your home against your income tax?

Mr. PETERSON. Well, it will certainly change some of it because people have made decisions on their tax breaks over the past several years rather than upon a good basis.

Senator ABDNOR. You're talking about business now?

Mr. PETERSON. Well, I'm talking about homeowners, all of us. We make investment decisions or buy homes based on the tax breaks we get and the tax system shouldn't be devised that way. We should have a tax system that is neutral in this respect and make decisions on whether they're good investments or not.

Senator ABDNOR. Mr. Sweet left, too. You raised a very, very good point and I'm glad to have that. As I say, I've got to do a lot more studying and I don't think we're going to see this tax bill this year. First, I would be amazed if we do and second, I don't think

you're going to recognize it from the one that actually went in. We've got what we call the Gephardt-Bradley bill. Then you've got the Kemp bill, which was the second one, and there are some different views on that, and I'm sure you're not going to be able to find a room in Washington with as many hotels as we have. We've got more people in there lobbying on that bill and more will be coming than for any piece of legislation that's been before Congress.

Mr. NERISON. It may not be a financial problem, but it's going to be a psychological problem when you come to an area such as taxation.

Senator ABDNOR. Well, I can hardly argue that. Some of the things I see in the proposal look about as complicated as what we had before. We just have to give this a lot of study, but it is very closely related to education; no one can deny that.

Thank you very much. Two other witnesses have asked today if they could appear, and we are happy to let them if time allows. One is Tom Fergen of the Letcher High School. Tom, we thank you for coming.

STATEMENT OF TOM FERGEN, VOCATIONAL EDUCATION TEACHER, LETCHER HIGH SCHOOL

Mr. FERGEN. Thank you for sending out the cards and making me aware of this. I'm the vocational technical teacher at Letcher High School and it's a small school. Presently our enrollment next year will be 46. I believe that there is quality education in a smaller school. You can do more with a student in a small school because of the more one-on-one contact between the teacher and student. Bigger is not better. You lose a lot. You lose a community, and when you lose a school, the town becomes forgotten and when the town dies, dollars that would be spent in the neighboring larger schools are no longer spent because take like Letcher, Spencer. There's a lot of these—a lot of these people in the Mitchell area that derive some of their business off of these people. Like Harv's Sport Shop, he makes part of his living this way, and there is other needs that the larger town gets from the smaller school.

Another thing that is hurting, especially in vocational, is the fact that I think our vocational needs of students are not—are slowly being forgotten. The vocational needs of the school are being crowded out because the emphasis is being on academic learning more so, because for instance the foreign language requirement in the State. Statistics show that 20 percent of high school graduates go on to college right now. I think we are forgetting about the other 80 percent. The other 80 percent need vocational training in high school so they can go out and find a job.

I think in South Dakota a lot of our jobs—if we want to keep these kids here so they can raise a family, so they can keep that school going in the community, a lot of these jobs are vocational in nature. You talk about Trail King provides a lot of jobs. I have had students go directly out of school into jobs such as these who have taken vocational classes and I think we are tending to forget about that type of learning in South Dakota. I know the push has come from the national level toward more academics, but we are starting

to—I think we are leaning the wrong way here a little bit and I wish we could lean back toward vocational needs of these kids.

Senator ABDNOR. Well, thank you. I certainly wouldn't quarrel about vocational education. I think it's probably done more for the State to help industry to date than any phase of our education. If we could just keep our engineers here, but the more that leave, the farther back we go. I heard today about vocational education and I am going to get into this deeply because it really affects rural America, and I am very concerned about it, too. Do you have any formulas of Federal dollars that said you've got to have so many students at school? I don't know. I don't think so. I'm sure back in New York they probably think that a high school of 60 is unbelievable, but I tell them I was a graduate of a class of 14, but again that's a disparity that is different between big cities and states than the rural.

Well, we appreciate your coming. Your comments will be made on record and we will keep them because we know that this is an important issue. I am more concerned about these declining businesses and farms. If you lose another farmer, every time a business closes, that makes it that much tougher to find dollars to run the school.

Mr. FERGEN. The comment, getting back to this matter, my first—what I said here, like if we lose the smaller towns around here. I live in Mitchell. I teach in Letcher and I can see if we are going to lose a town like Letcher, the town of Emery, the town of Spencer, the town of Mount Vernon—these people come to Mitchell to do business. Mitchell is going to be hurt, too.

Senator ABDNOR. While we are on that, I used to be a school-teacher back in the early fifties, but what do you think the break-off point ought to be where the schools should be operating now?

Mr. FERGEN. I think the law was established—I don't know when—at 32 or 35. I think we should just leave it at that right now in South Dakota. Of course, the education reform bill has been put on hold on account of a referendum initiative. I think we should just leave it the way it is and let it work out from there. I think raising it up to 45 hurts too many towns, too many communities, especially with the agriculture economy the way it is now. It's really going to put a blow on a lot of towns.

Senator ABDNOR. Well, we thank you very much. One other witness here and that's Kim Hansen. Welcome to our hearing today, Kim.

STATEMENT OF KIM HANSEN, PRESIDENT, LETCHER CHAPTER, FUTURE FARMERS OF AMERICA

Mr. HANSEN. Thank you for allowing me to speak. I'm president of the Letcher FFA Chapter. Recently at the State FFA Convention up in Brookings, our chapter—they received three State Farmer Degrees and three first places in the individual contest areas. A larger chapter, Brookings, for example, they only received one State Farm Degree and one individual—one first place in the individual contest area. Another example of this would be Tulare. They had several first places in the contest areas while the larger chapters such as Rapid City and Watertown, they didn't—they had very

little success in these areas. Now, I feel that this shows that—this relates almost directly back to the education that they must be getting in that school. In the smaller school, it seemed like there is more student-teacher contact. I noticed that when I went to Forestburg that was recently closed and I talked to students from other schools such as Sioux Falls and that, and most of them—they say that the teachers only know them by name. They don't know them personally, they don't really care if you pass or flunk or anything.

Senator ABDNOR. Well, Kim, what were those awards you're talking about? I know what FFA does. I go to your national breakfasts down there. We just had two young women from Lake Preston and a young man from Baltic a few weeks ago. Maybe we will see you down there sometime, but those awards, what was the basis for them?

Mr. HANSEN. Proficiency awards such as in electrification and farm management and home and farm improvement, pork efficiency.

Senator ABDNOR. Do you attribute it much to the classwork that you got back in the school and the individual attention? Are you going to be a senior next year?

Mr. HANSEN. Yes.

Senator ABDNOR. How many in your class?

Mr. HANSEN. I think there are about 16.

Senator ABDNOR. Close to mine.

Mr. HANSEN. Yeah.

Senator ABDNOR. Well, thank you very, very much for coming.

Mr. HANSEN. Thank you for allowing me to speak.

Senator ABDNOR. We have a few more minutes. I don't want to shut anyone off if someone came here with the idea of speaking. Did I see a hand up?

STATEMENT OF MRS. TED NELSON, SR., LETCHER, SD

Mrs. NELSON. I am Mrs. Ted Nelson, Sr., from Letcher, SD, and I appreciated all the information that we have heard this morning and certainly am in agreement with it, but I'm also concerned about what the children and the young folks are being taught in school. First of all, we feel that there is too much time and money spent on extracurricular activities taking away from the learning time. This we need, a small percent. For instance, Friday, set aside Friday and possibly Saturday for extracurricular activities because after all, when the student graduates, what has he accomplished and how much has his education prepared him for the future; and besides extracurricular activities, also, what are they being taught concerning Americanism?

It seems like communism is making a great inroad into our country and is being taught, for instance, throughout, with humanities and humanism. It's taking away from our American heritage and I have read open forum letters and read other places where the children are being taught communism in subtle ways. It makes them ripe for communism later on in life and this has also been proven by what—how communism grew in Europe and other countries. They started in the grade school and through their education, and like I say, in subtle ways and before the country knew it, they had

fallen into communism. One lady who has left Austria because of communism lives in Pierre, SD, said that through sports, they were even suggested to the students that wouldn't you rather be spending your time with sports than going to church, and the young folks, a lot of them agreed in Austria and before they knew it, they had fallen to communism. So let's remember the quality of education, why are we being educated. We want to preserve America.

Senator ABDNOR. Mrs. Nelson, let me just say I know how strongly you feel. I know you're a good friend and I'm sure you don't want me in Washington to dictate what you're going to teach in your school system. You want to at least keep that on a local basis. If you let the Congress and the bureaucrats do that, you won't have much to say. I'm correct, you really don't want to see it coming from us, do you?

Mrs. NELSON. Not necessarily, but to the people in charge of education—

Senator ABDNOR. You got your best chance on the local level, I suppose.

Mrs. NELSON. Yes, and what we are very concerned about are these speakers that are coming into the schools and speaking, promoting communism, and I do remember in Karl Mundt's days he had this rule of—now, I can't think of the word—that they sign a loyalty oath to America, and I think this is good because we are hearing that a lot of communism and socialism is being taught, and I'm very concerned about the future of America.

Senator ABDNOR. A good point. Thank you very, very much. It's almost near the hour of 12 o'clock. Is there anyone else?

That will conclude our hearing for today, but it doesn't conclude the subject of education as a hearing. I hope that we can assimilate this material and disseminate it to our colleagues in Washington who are from rural and less urban states because I've got to get the involvement from them.

When you think about it, when 75 percent of the people in this country live on 2 percent of the land, I think that kind of tells you the problem we are having. So I think we are doing a better job of making people aware of this in Washington. It's a little hard to persuade certain Members of Congress they ought to go along with us from the rural areas, but we keep plugging away; but I think they have concern for quality education. I have always been quite proud of South Dakota's education. It's got a quality education in K through 12, but we do know what the stress on business in farm areas has been and they have to help finance this. It is a real, real problem for the months ahead and years ahead if we don't get it turned around, and that's why I welcome this opportunity to really come out to the heart of rural America and where we mean rural America.

In Washington, you are rural if you're under 50,000 population in a city, which means we have only one, Sioux Falls, that's considered a city. Even Rapid City is rural. So there is a definition of rural and we are rural-rural if we could put anything that way. So your testimony today has been very helpful and certainly will be brought to the attention of the entire committee and hopefully we can get it out to our other members and eventually keep you people talking. That's the only way we can get things done and I

guess now we've got to keep our eye on the tax bill, too. I know it's a big issue, but until today I wasn't thinking in terms of the damage it would do to the school systems.

So with that, we thank you all very much for coming out today. We appreciate the witnesses coming so far.

The subcommittee stands adjourned.

[Whereupon, the subcommittee adjourned, subject to the call of the Chair.]

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